

part of Baker Hughes. Unless other contract terms have been agreed to by the parties, each party's liabilities and obligations shall be governed by Baker Hughes Incorporated's Worldwide Terms and Conditions."

Log Run Summary

Run No	Bit Run No.	Bit Size (in)	Bit Type	Bit Gauge Length (in)	Assembly Type	Logged Interval		Bit Depth Interval		Date / Time		Circ. Hours (h)
						Top (ft)	Bottom (ft)	From (ft)	To (ft)	Start Logging	End Logging	
						1	1	8.500	PDC	2.00	Motor	

Crew

Name	Arrive Wellsite	Depart Wellsite	Name	Arrive Wellsite	Depart Wellsite	Name	Arrive Wellsite	Depart Wellsite
Adam Harris	2015-12-16	2015-12-19	Matthew Leopold	2015-12-16	2015-12-19	Mauricio Garcia	2015-12-16	2015-12-19
Ryan Kielian	2015-12-16	2015-12-19						

Mud Properties Record

Date / Time	Run No.	Measured Depth (ft)	Mud Type	Density (ppg)	Viscosity (cP)	pH	Fluid Loss (cm3)	Oil / Water	Source	Total Chlorides (ppm)	K+ (%)
2015-12-16 18:00	1	1930.00	Oil Based Mud	9.1	17	N/A	7.1	68.1/31.9	Active Pit	45500	0.00
2015-12-17 18:00	1	7194.00	Oil Based Mud	9.3	16	N/A	8.0	67.0/33.0	Active Pit	49000	0.00
2015-12-18 18:00	1	11789.00	Oil Based Mud	9.7	19	N/A	8.4	68.4/31.6	Active Pit	45000	0.00

Equipment and Service Data

Run No.	Tool	Serial Number	Measurement	Sensor Offset (ft)	Bit Offset (ft)	Max O.D. (in)	Min I.D. (in)
1	NaviGamma	12595928	Gamma (single)	9.75	40.14	6.750	2.750
1	NaviGamma	12595928	Directional (mag)	13.16	43.55	6.750	2.750
1	NaviGamma	12595928	VSS	13.16	43.55	6.750	2.750

Comments

- Depth measurements were obtained from a depth control system not supplied or operated by Baker Hughes INTEQ. Due to the lack of control by Baker Hughes INTEQ logging engineers, depth calibrations and measurements could not be independently verified.
- A sliding indicator is shown to the left edge of track 1 as a heavy line. The indicator has been depth-shifted to the Gamma Ray sensor offset to correspond with Gamma Ray data acquired while sliding.
- Baker Hughes INTEQ run 1 utilized a 6.750 inch NaviGamma (Directional and Gamma Ray) tool behind an 8.500 inch bit and steerable assembly from 1930.00 to 12833.00 feet MD (1892.42 to 7117.31 feet TVD).

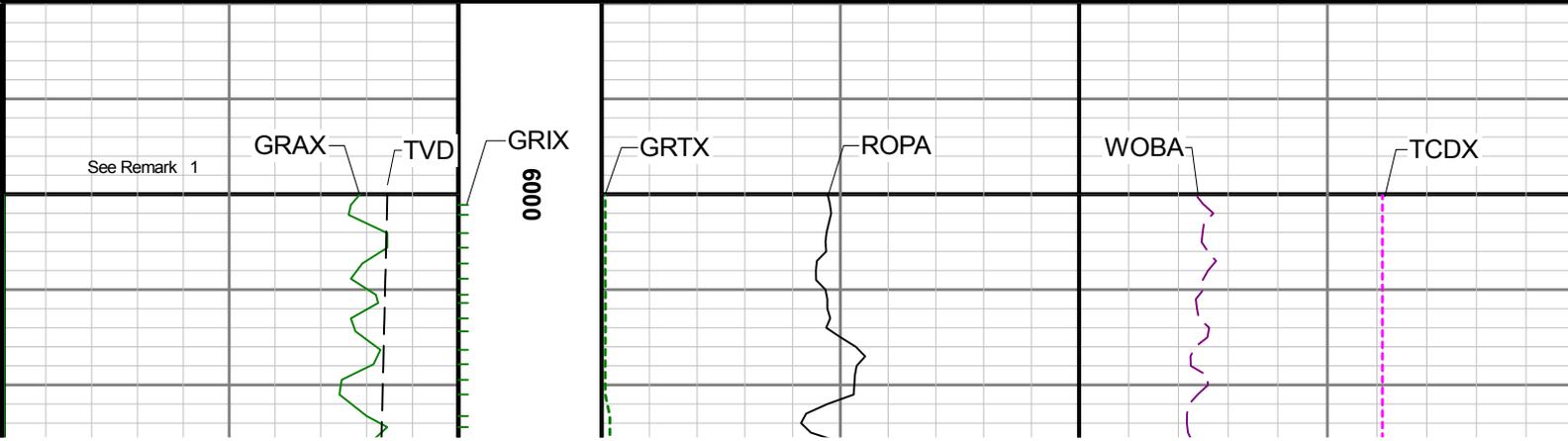
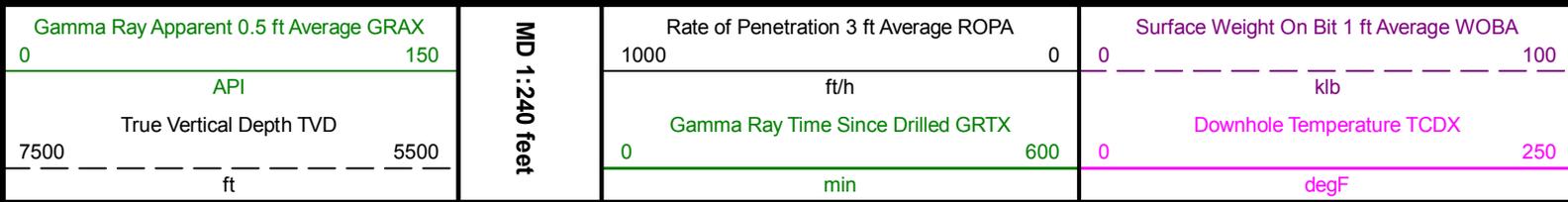
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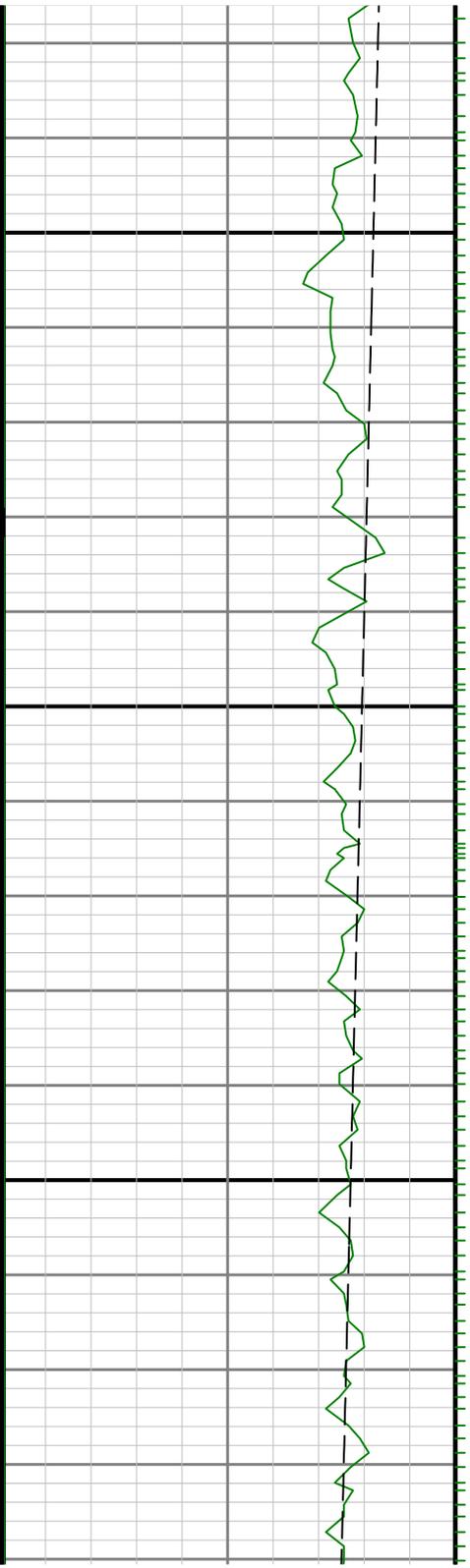
Number	Measured Depth (ft)	Hole Section (in)	Run No.	Remark
1	6000.00	8.500	1	Drilling data is not shown in the interval from surface to 6000.00 feet MD (5809.81 feet TVD) due to directional only services.
2	12793.00	8.500	1	The interval from 12793.00 to 12833.00 feet MD (7117.25 to 7117.31 feet TVD) was not logged due to sensor to bit offset at well TD.

Curve Mnemonics

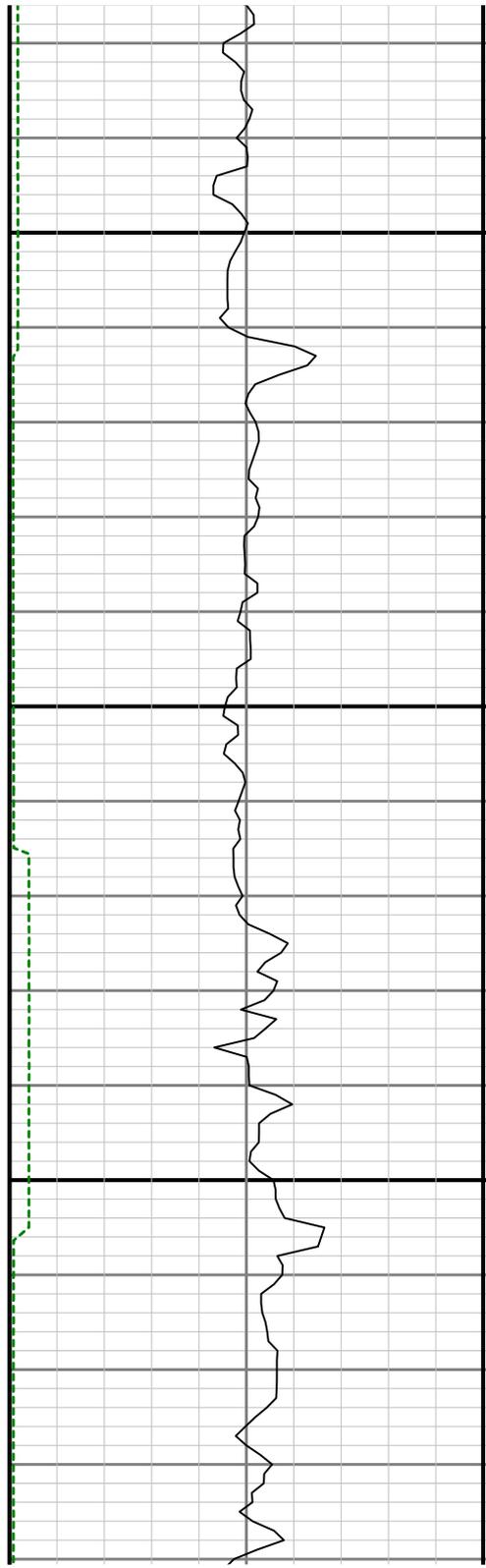
Presented Curves	Description	Units
ROPA	Depth Averaged ROP 3 ft Average	ft/h
GRAX	Gamma Ray - Apparent 0.5 ft Average	API
GRIX	Gamma Ray - Data Point Indicator	unitless
GRTX	Gamma Time Since Drilled	min
GRSI	Sliding Indicator Flag	unitless
TCDX	Downhole Temperature	degF
TVD	True Vertical Depth	ft
WOBA	Weight On Bit, Average 1 ft Average	klb

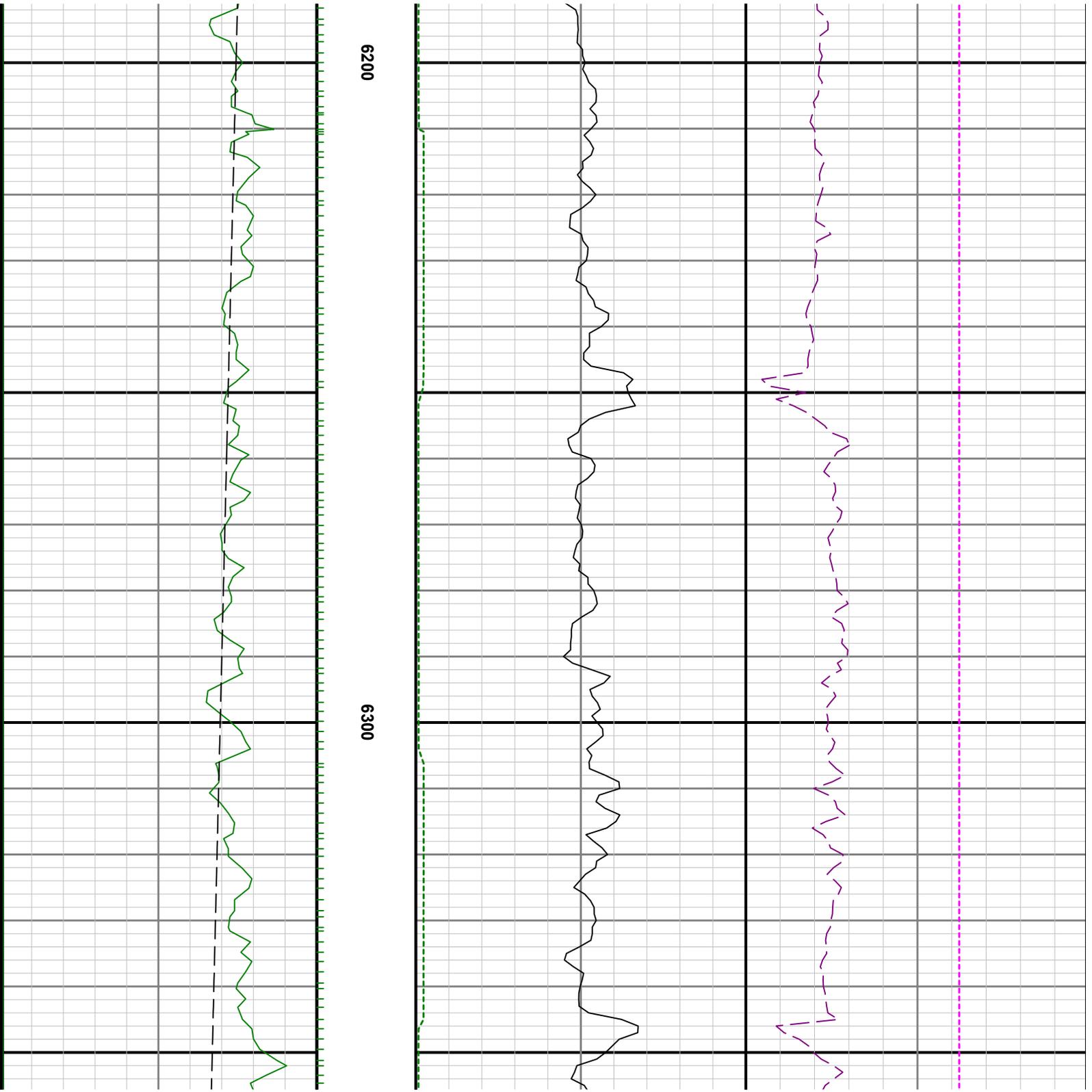
	Company	Anadarko		
	Well	ALVIN 27G-29HZ		
	Interval	Date From: 2015-12-17 10:00	Top: 6000.00	Date To: 2015-12-19 00:31
	Created	2015-12-19 04:37	Bottom: 12833.00	

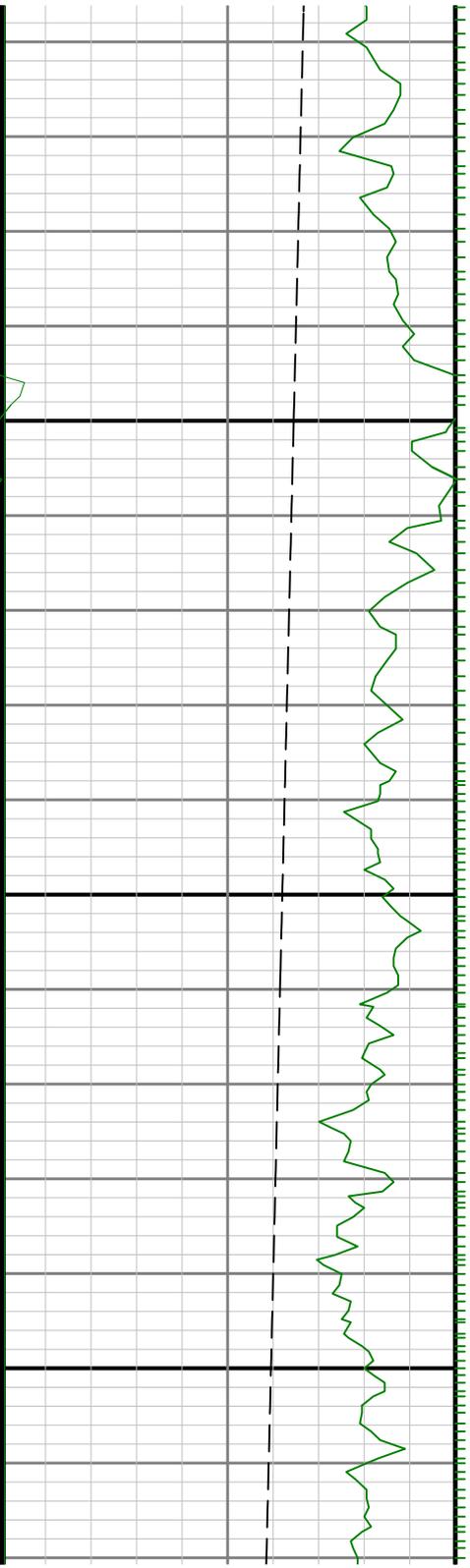




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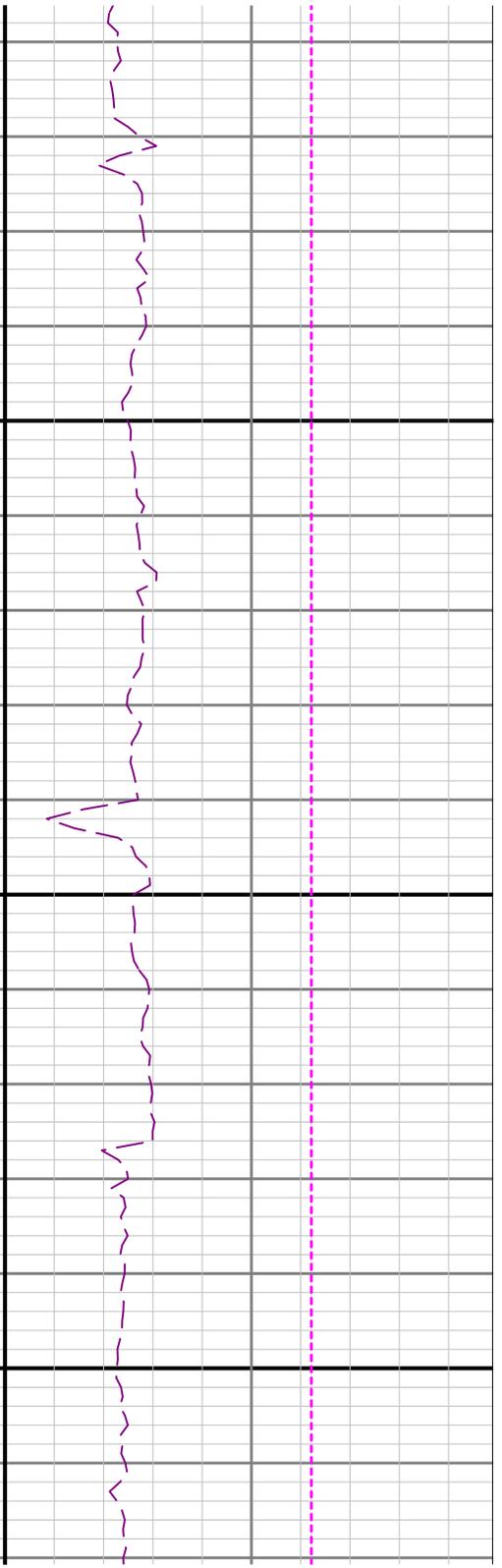


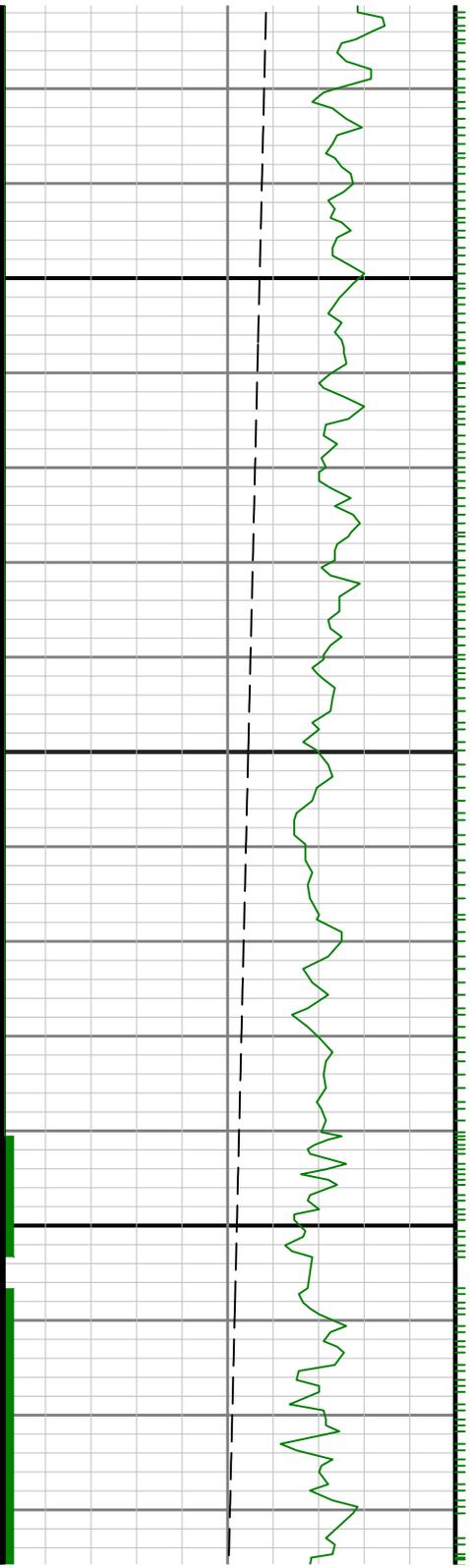




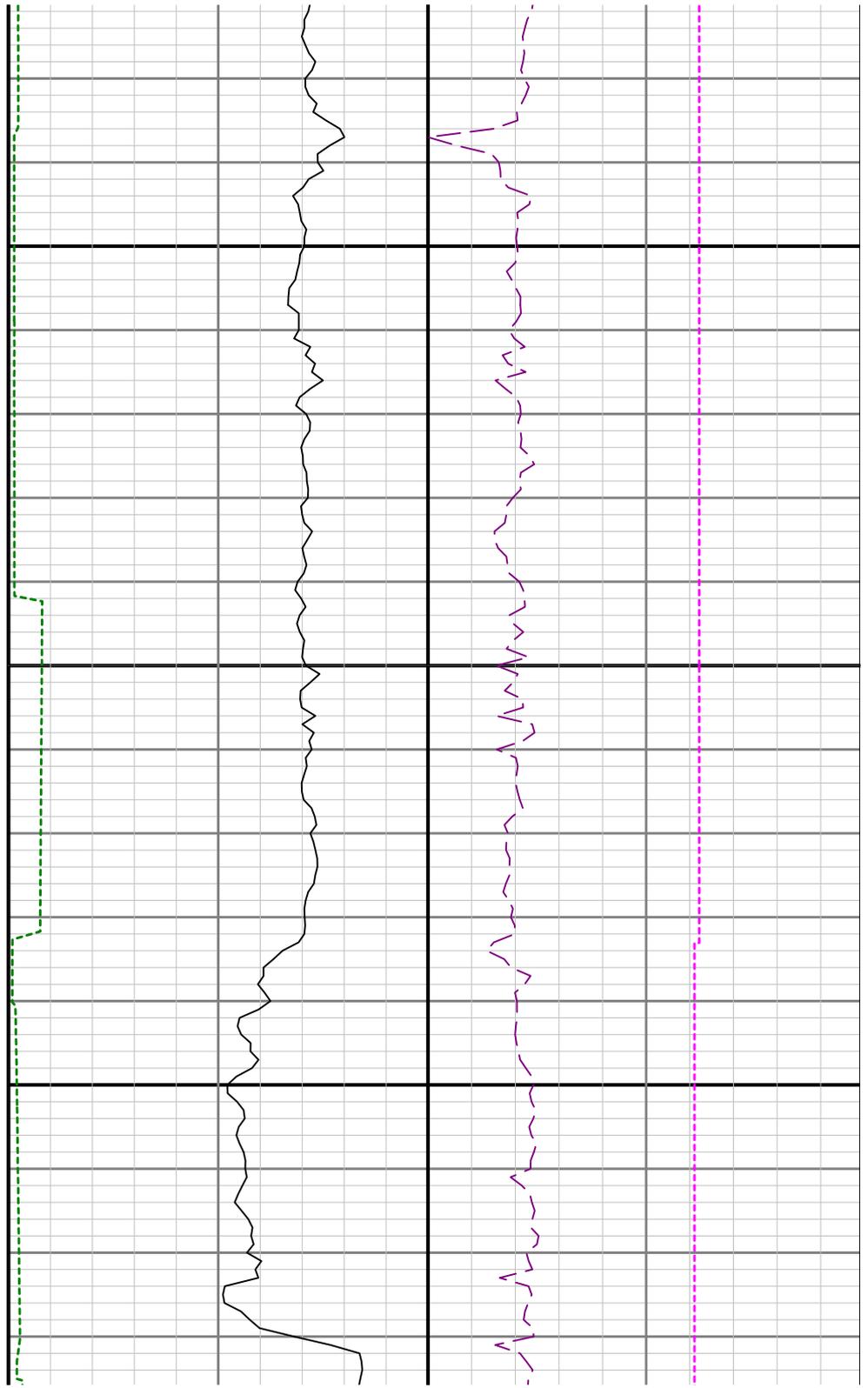
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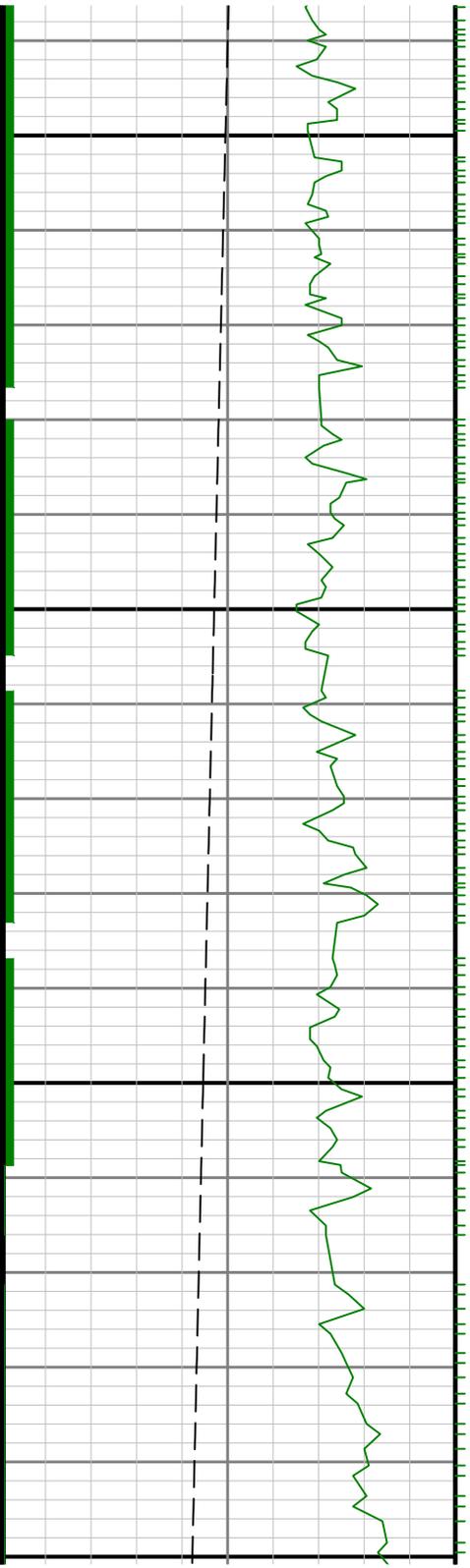
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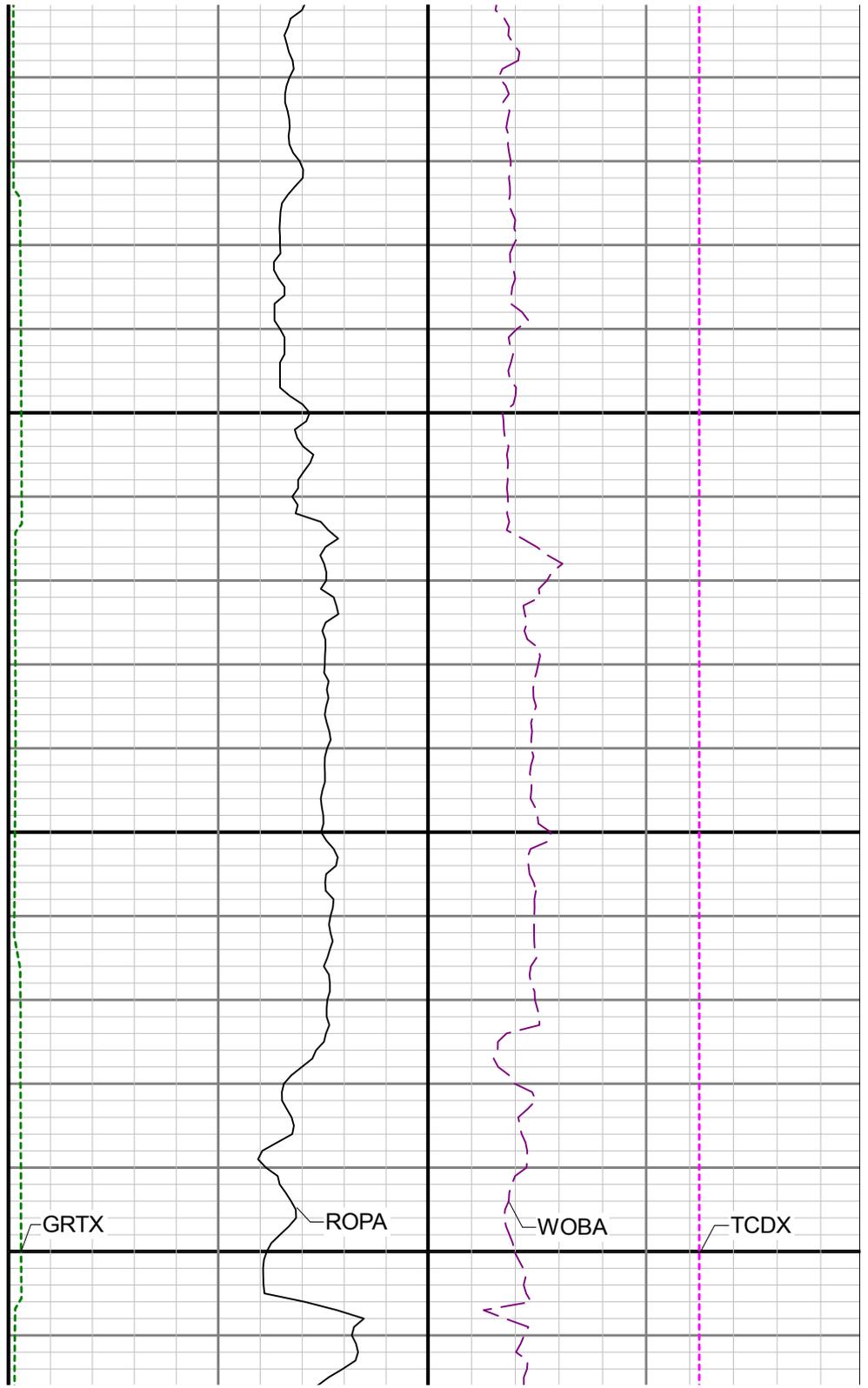
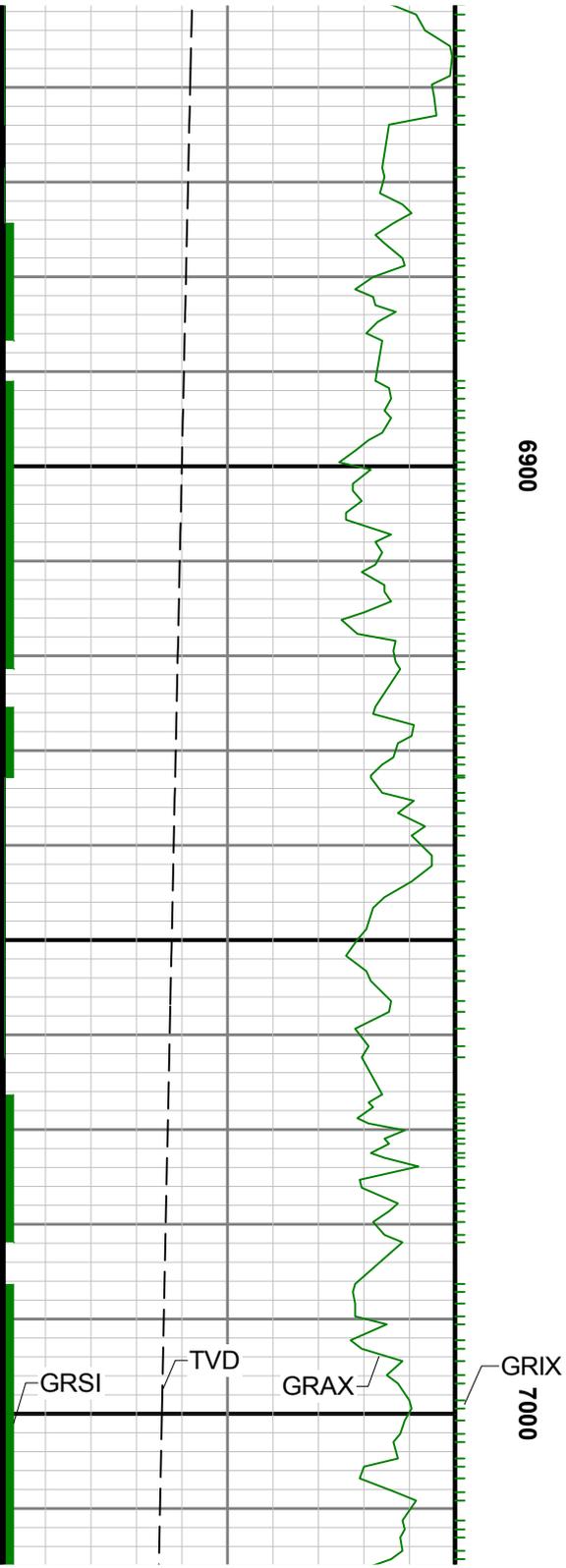


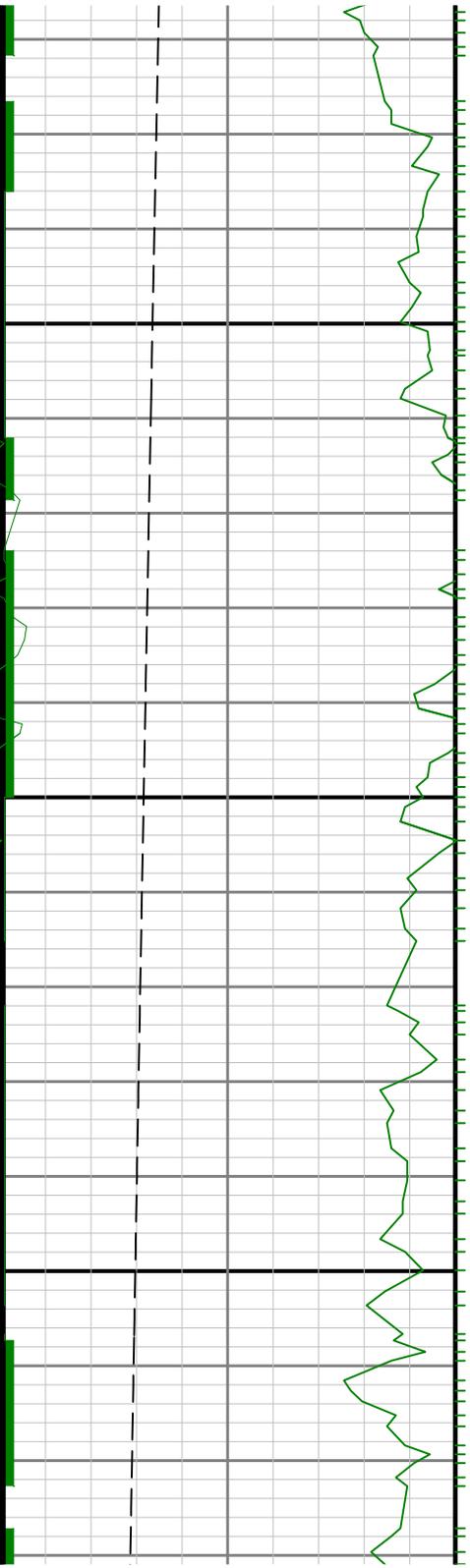


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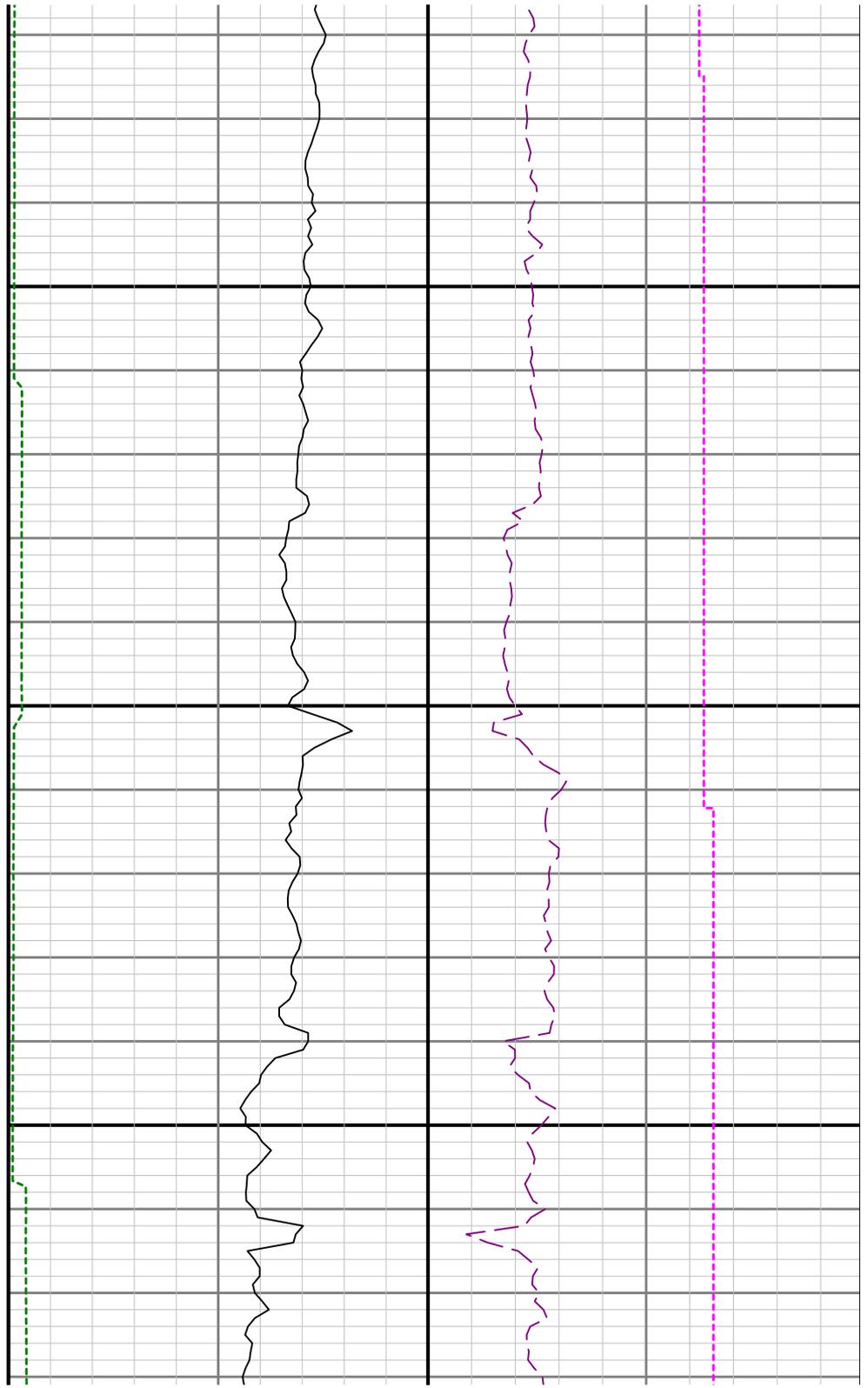
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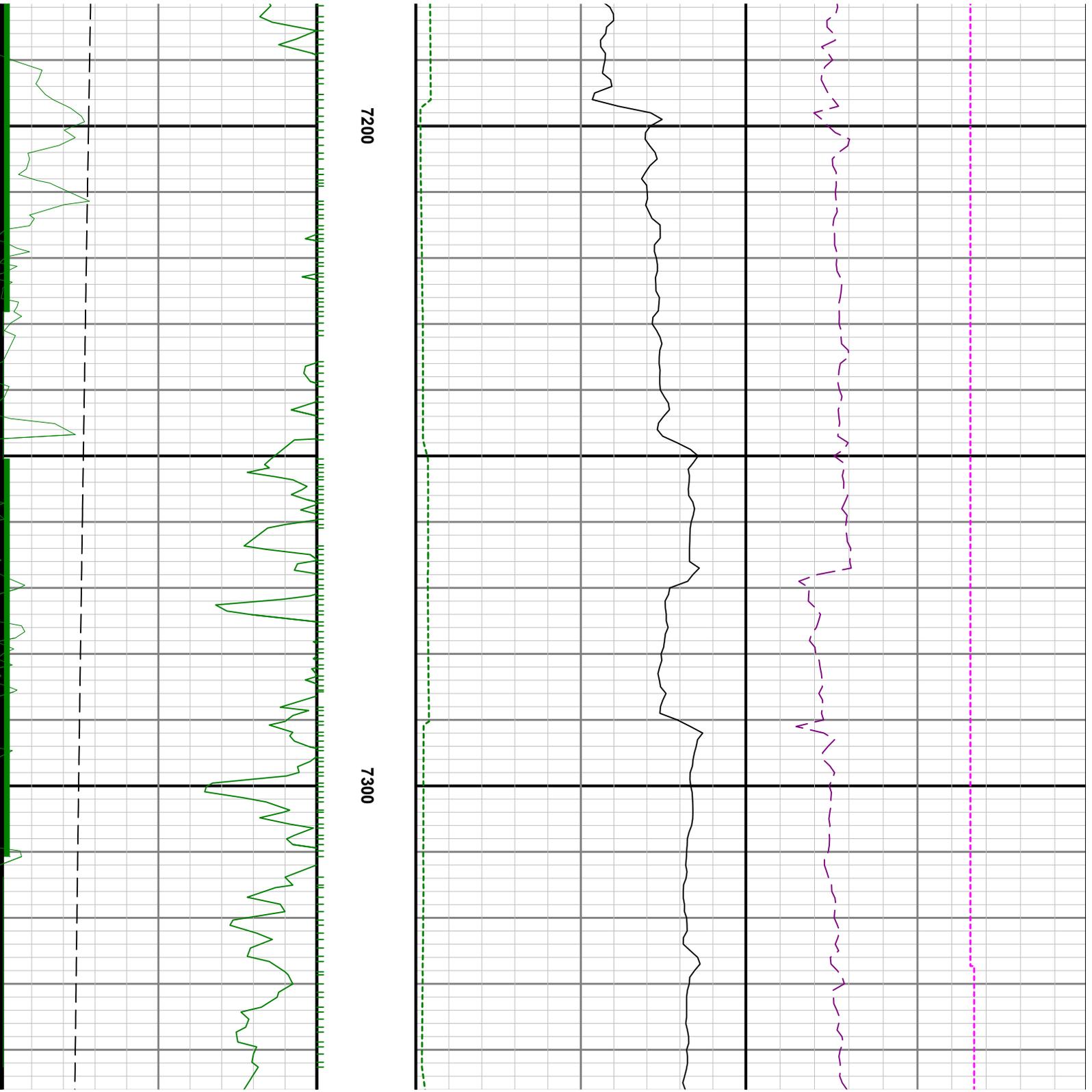


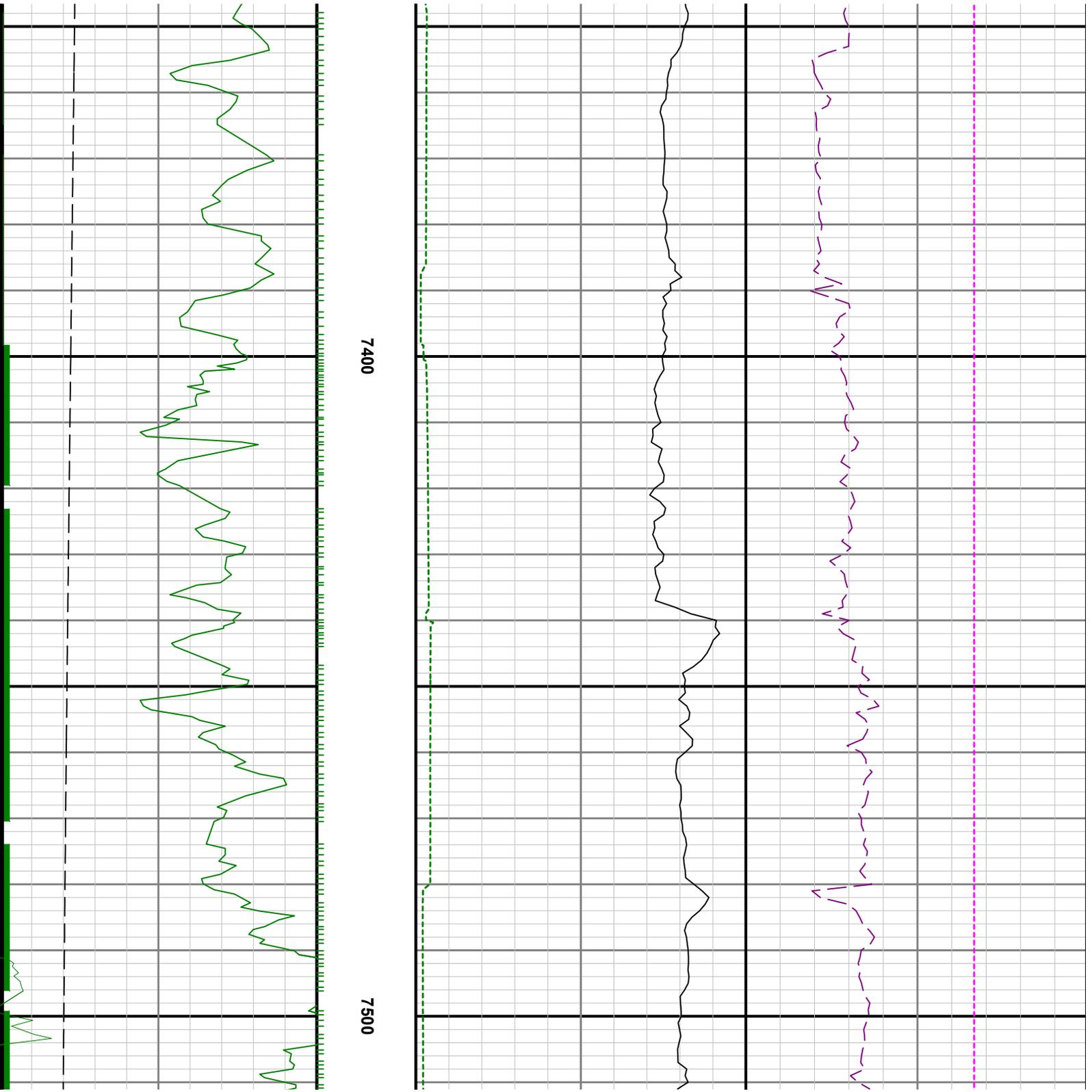


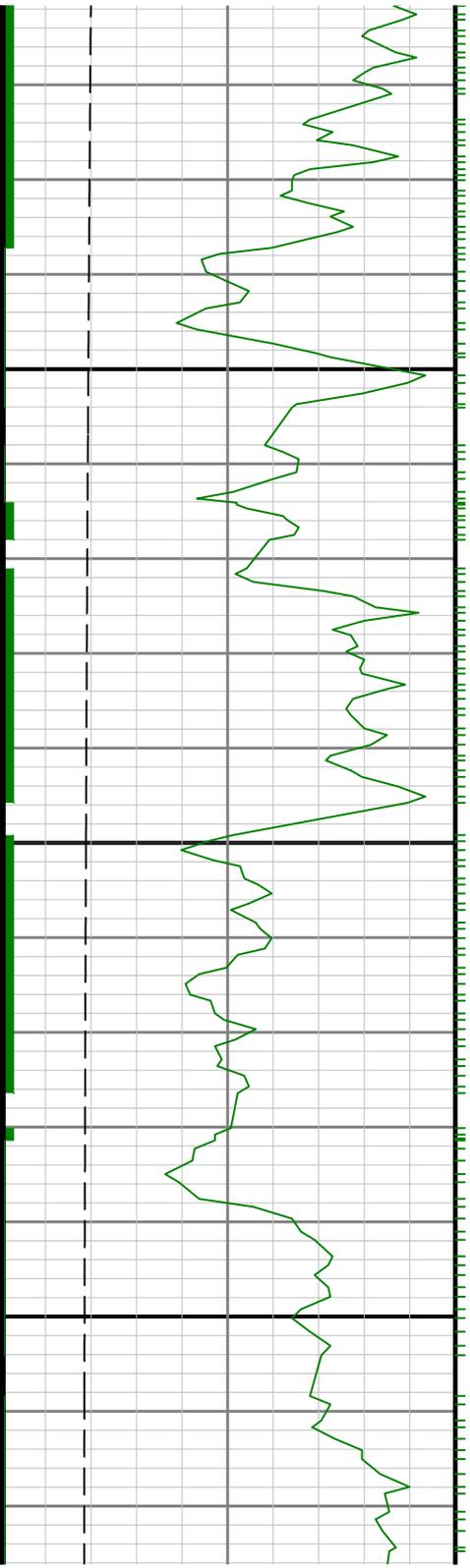


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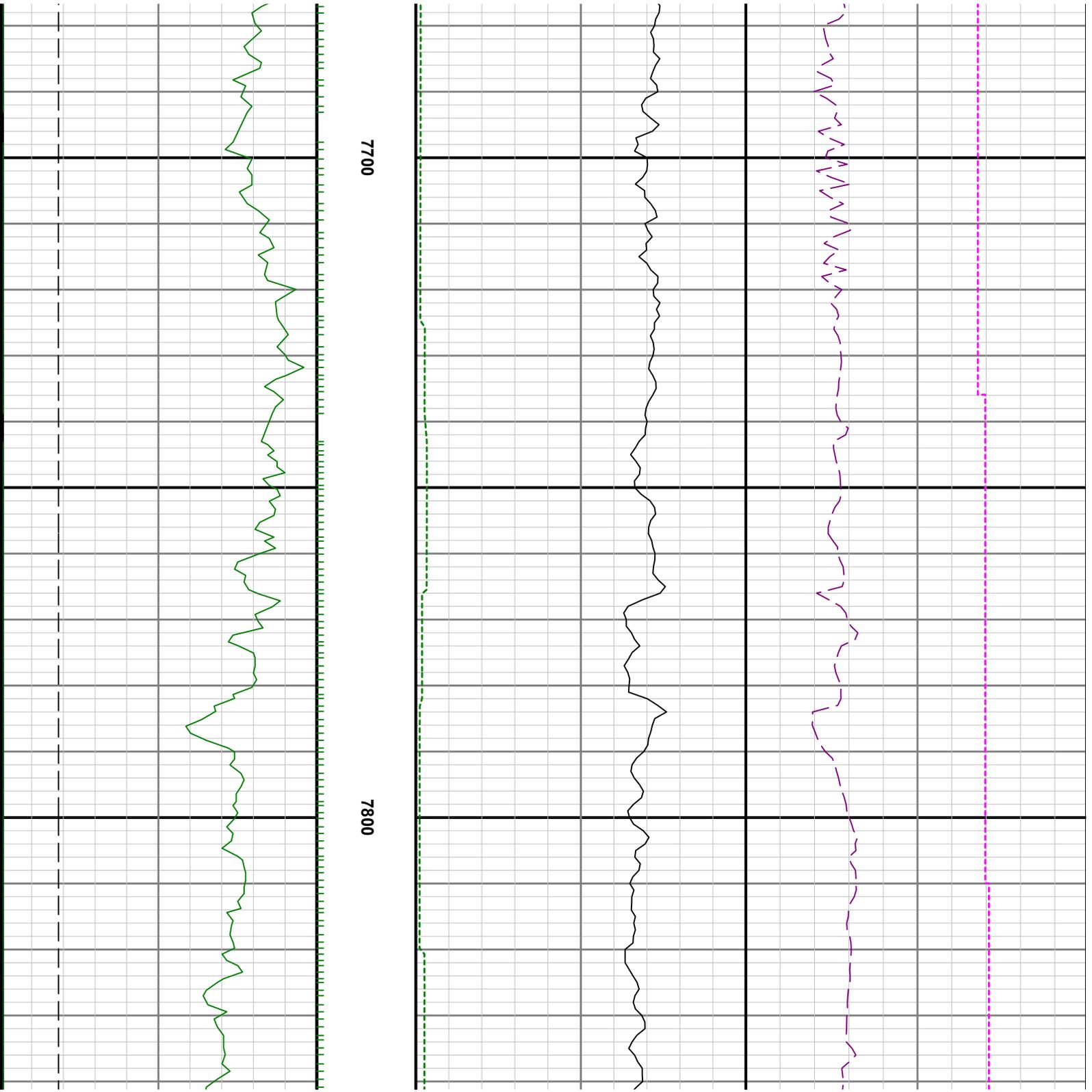


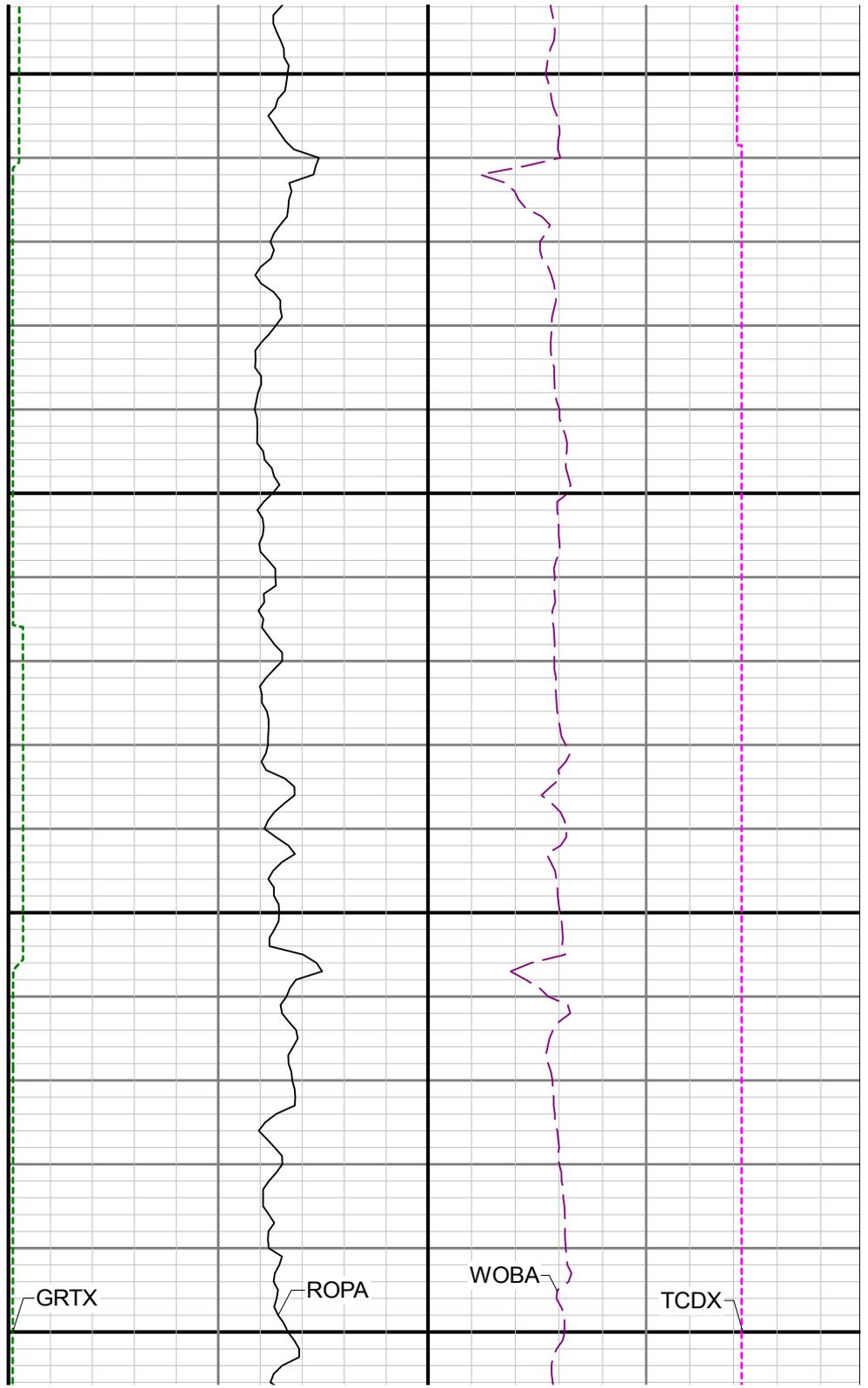
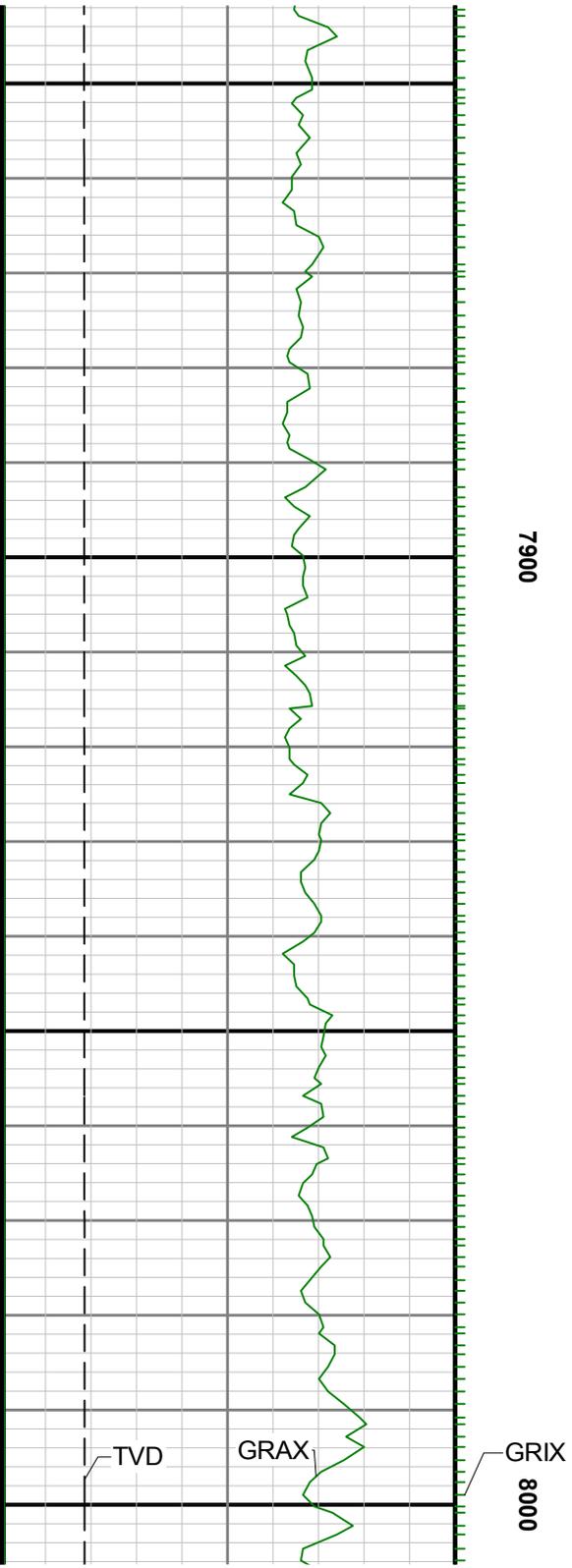


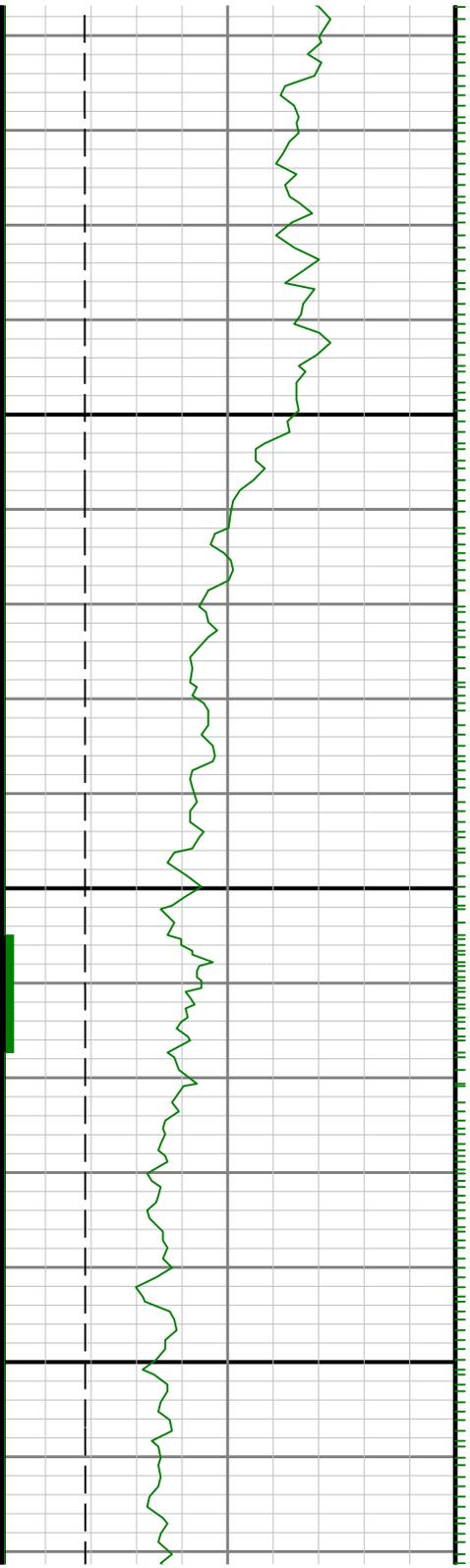


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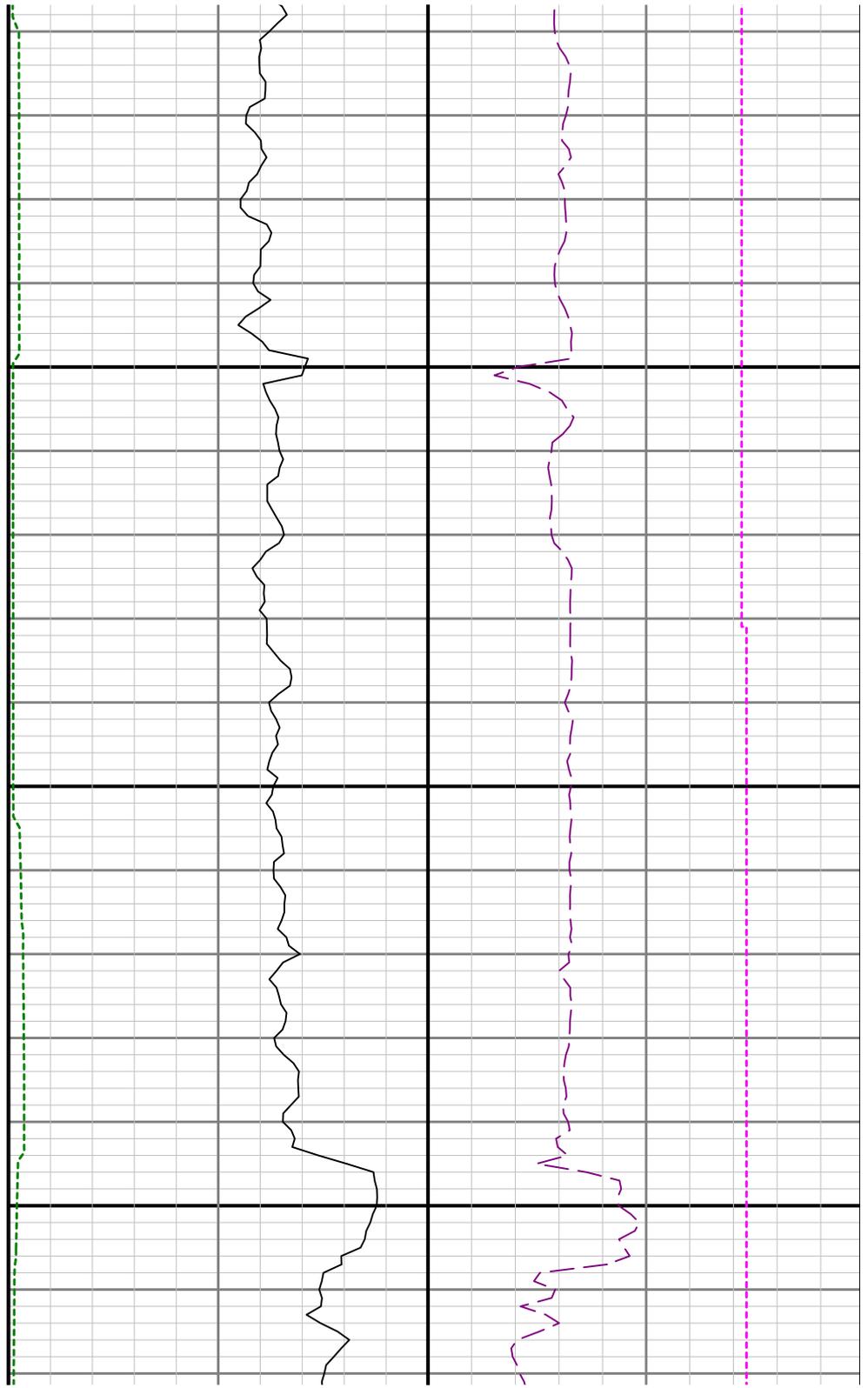


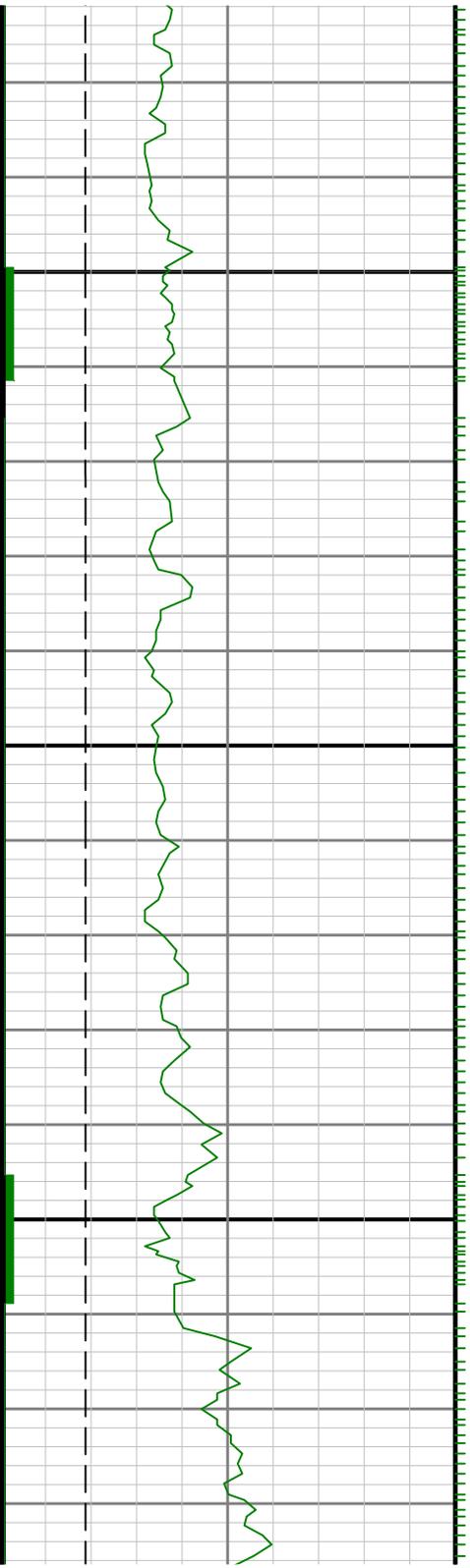






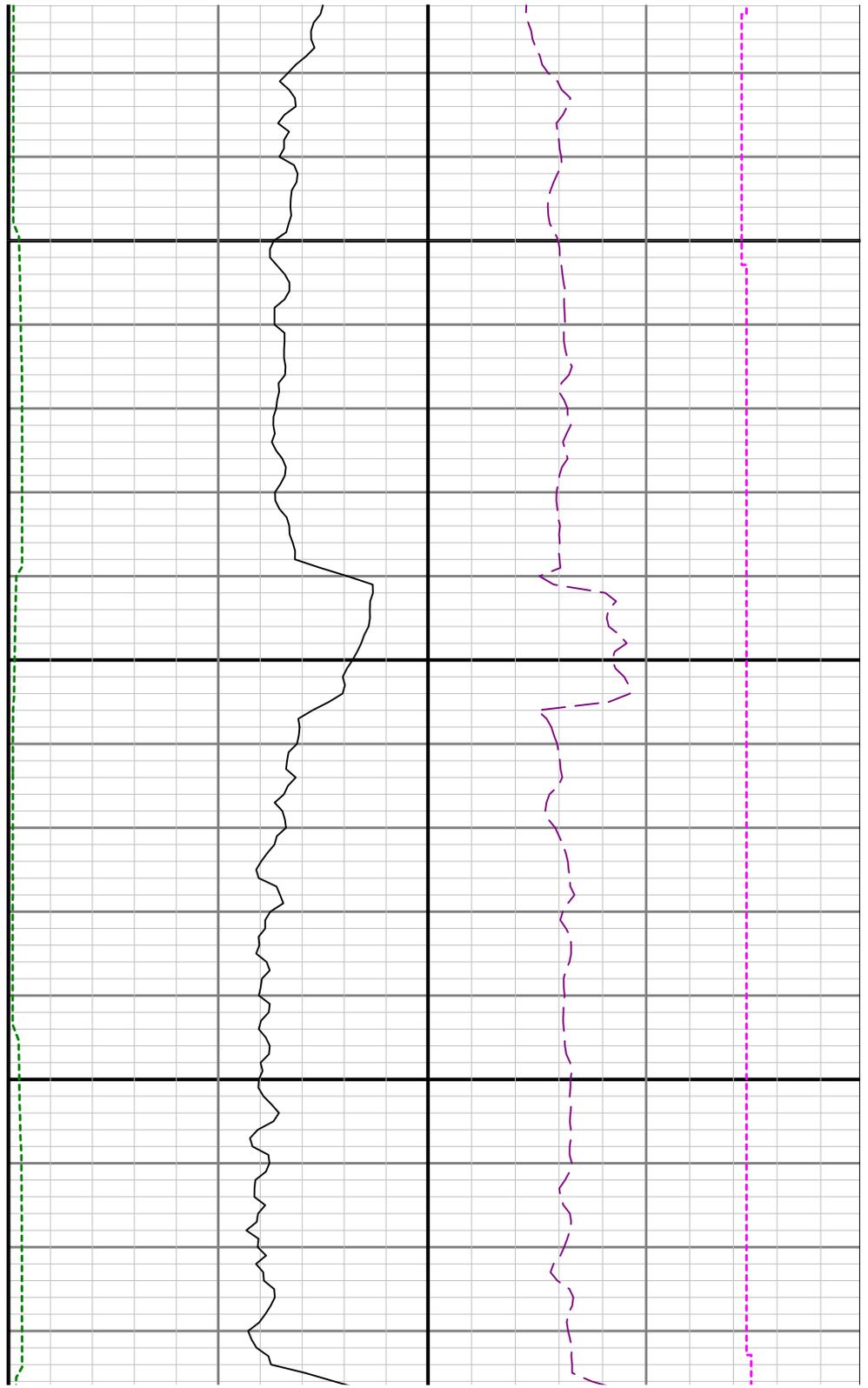
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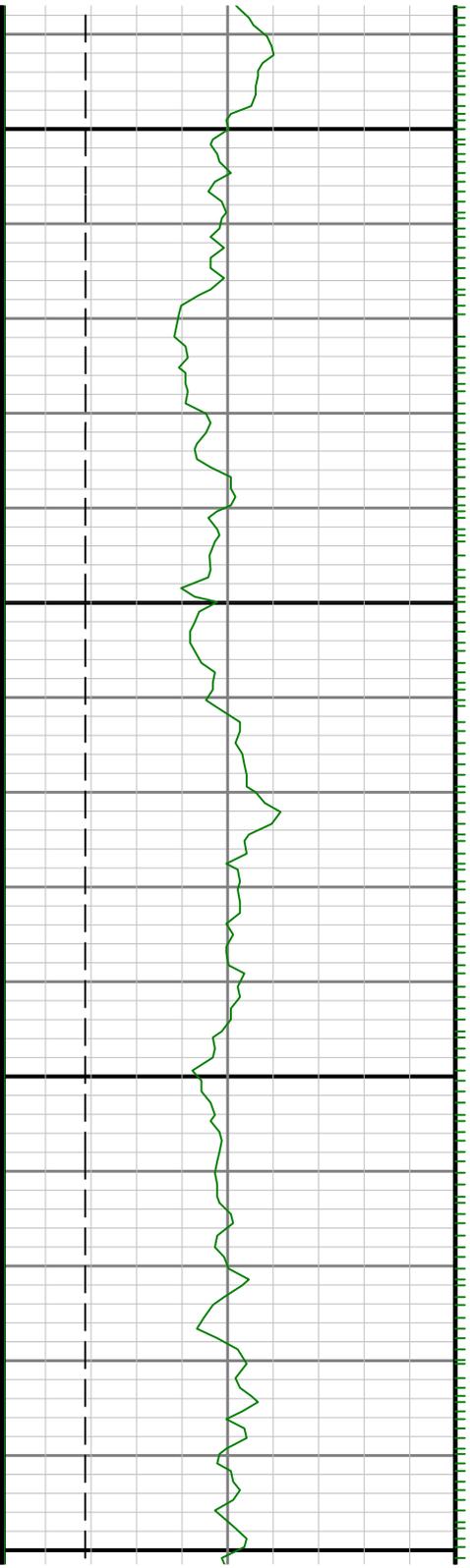




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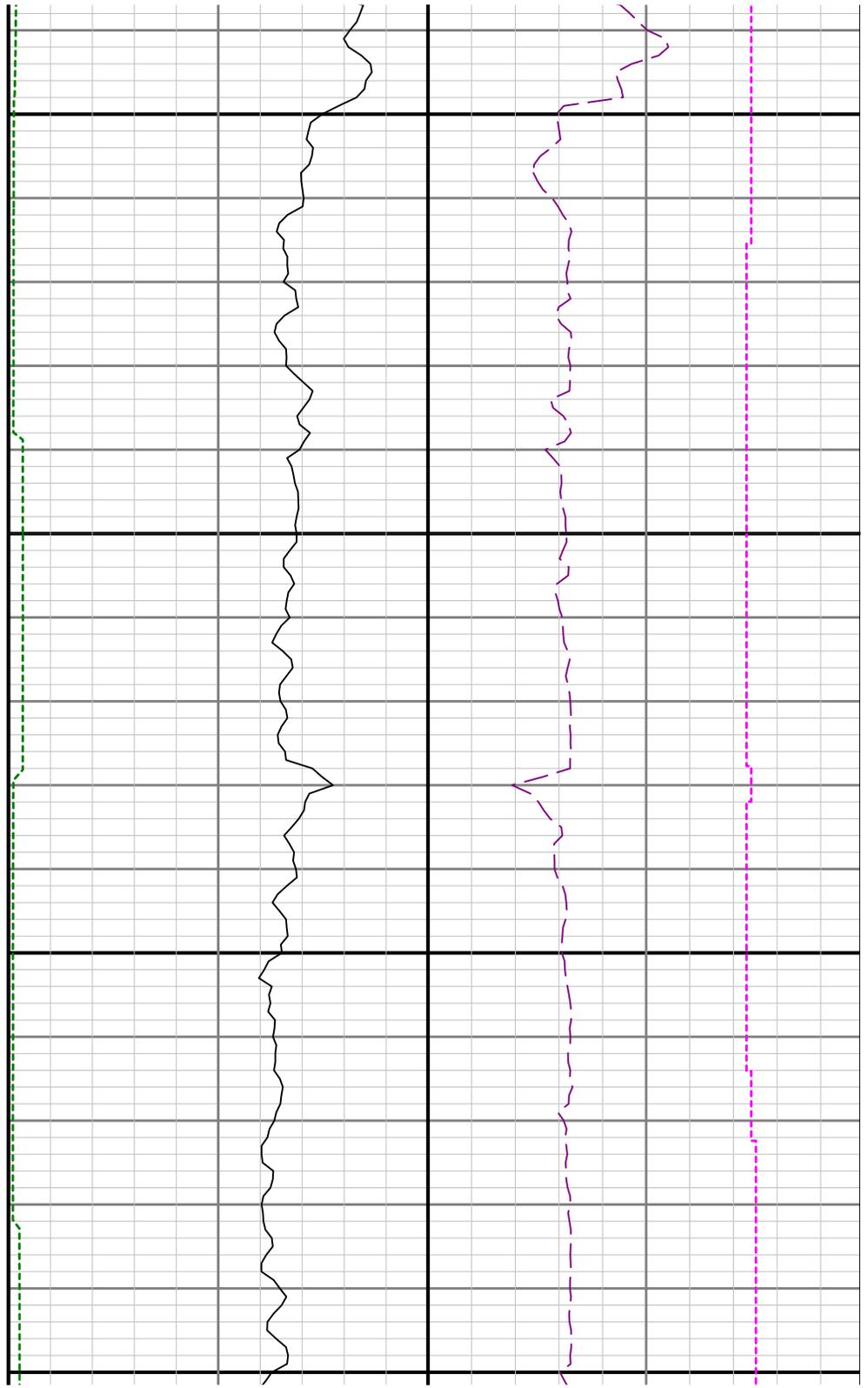
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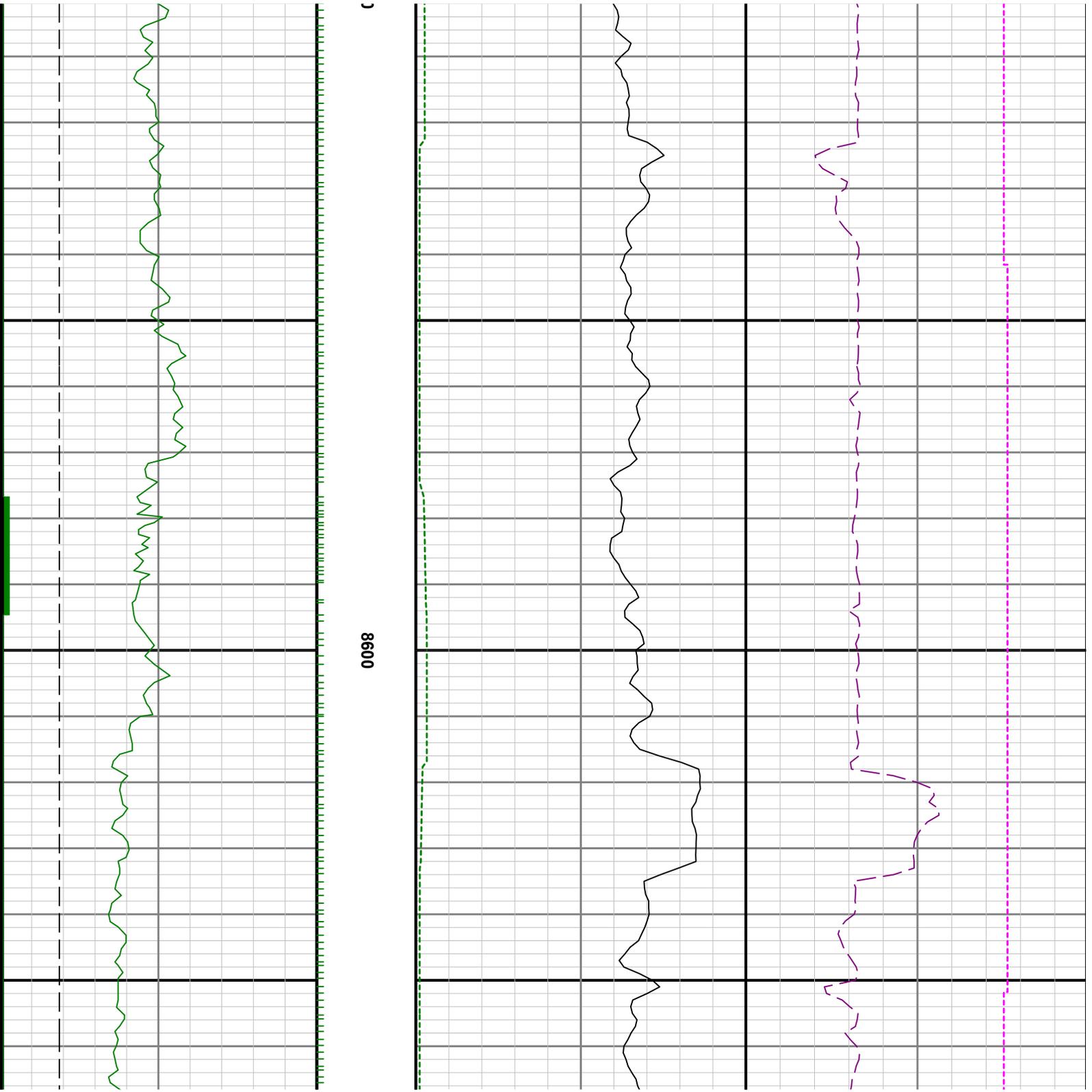


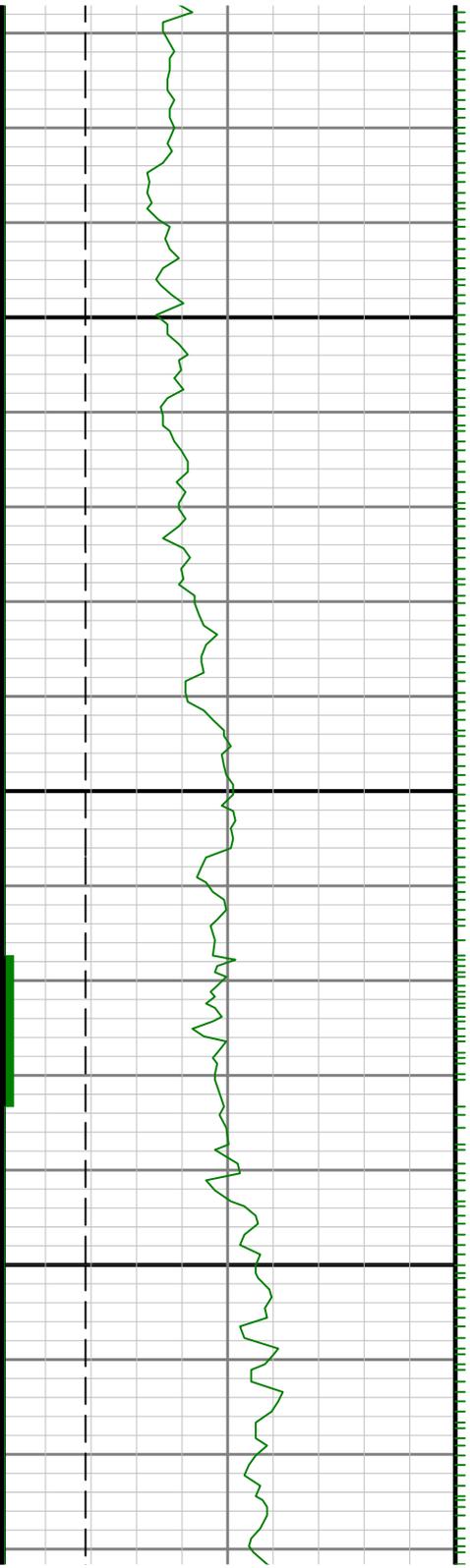


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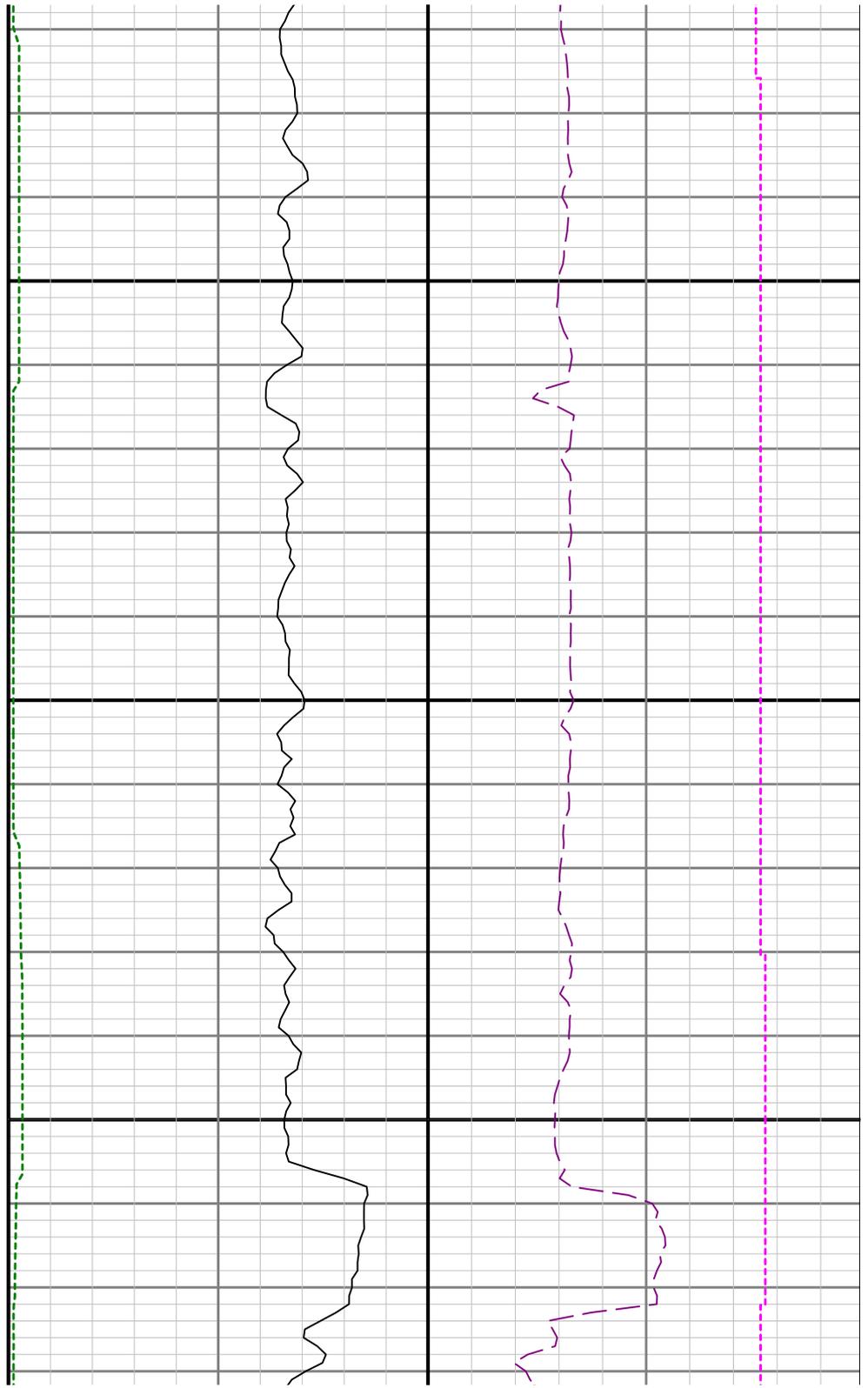


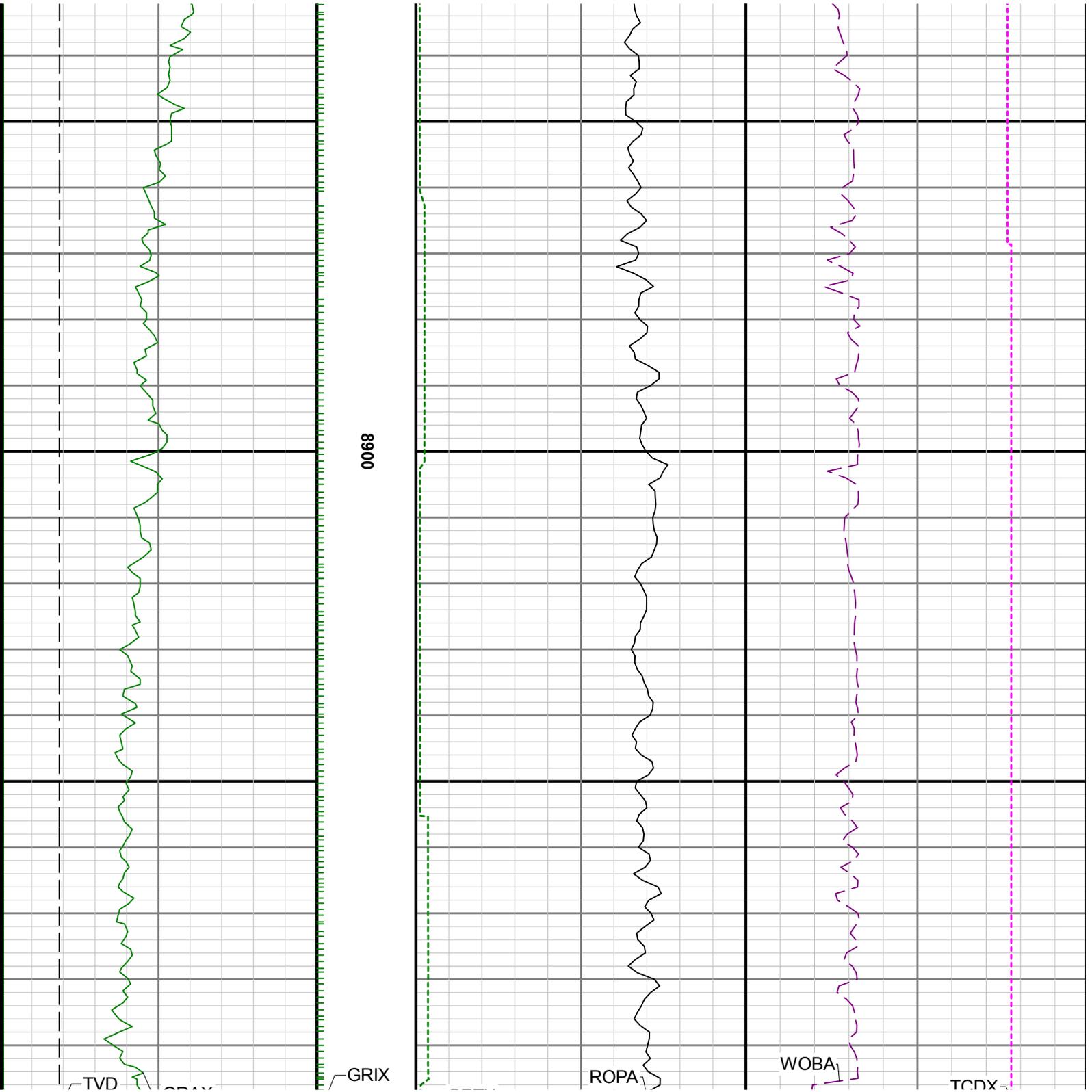


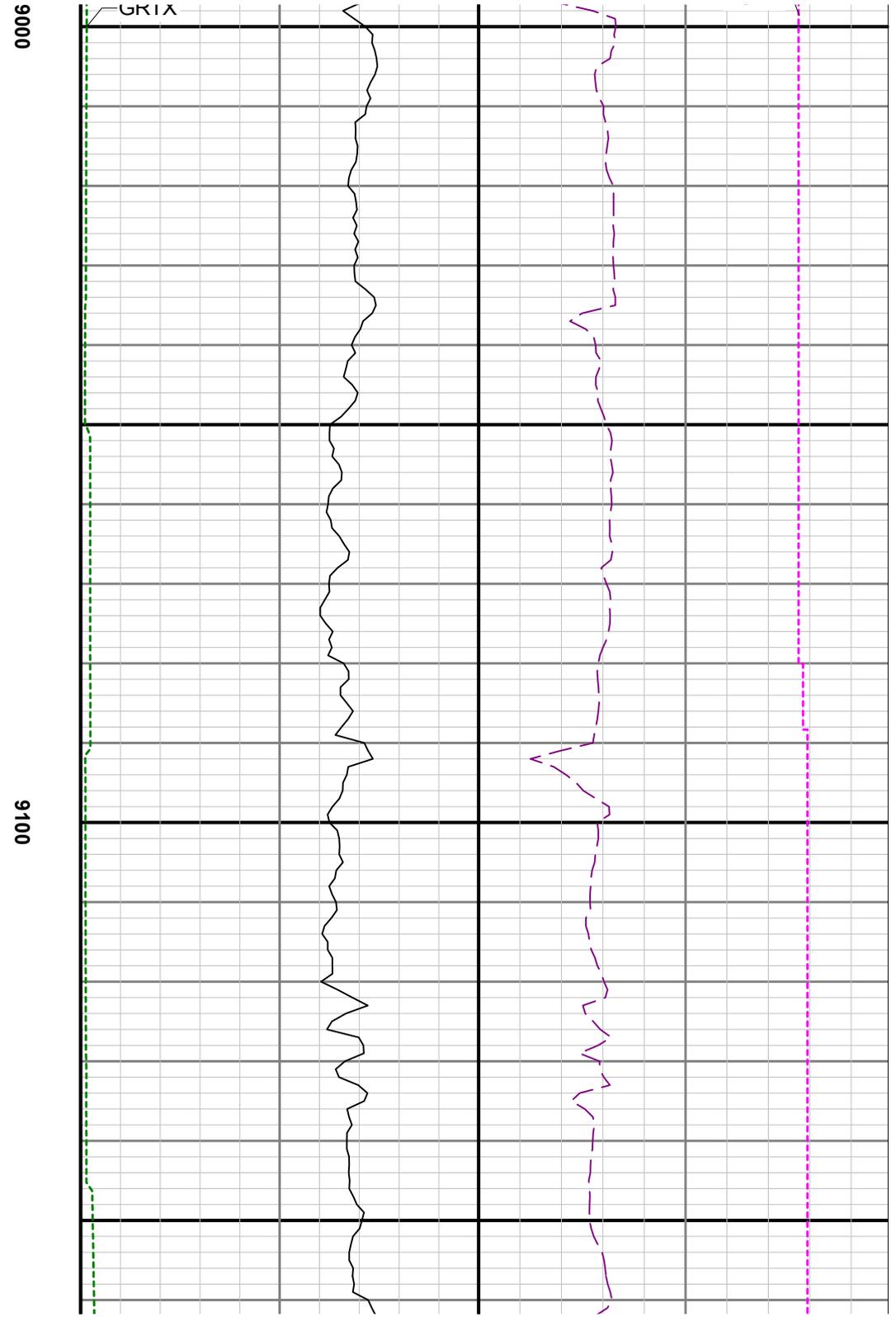
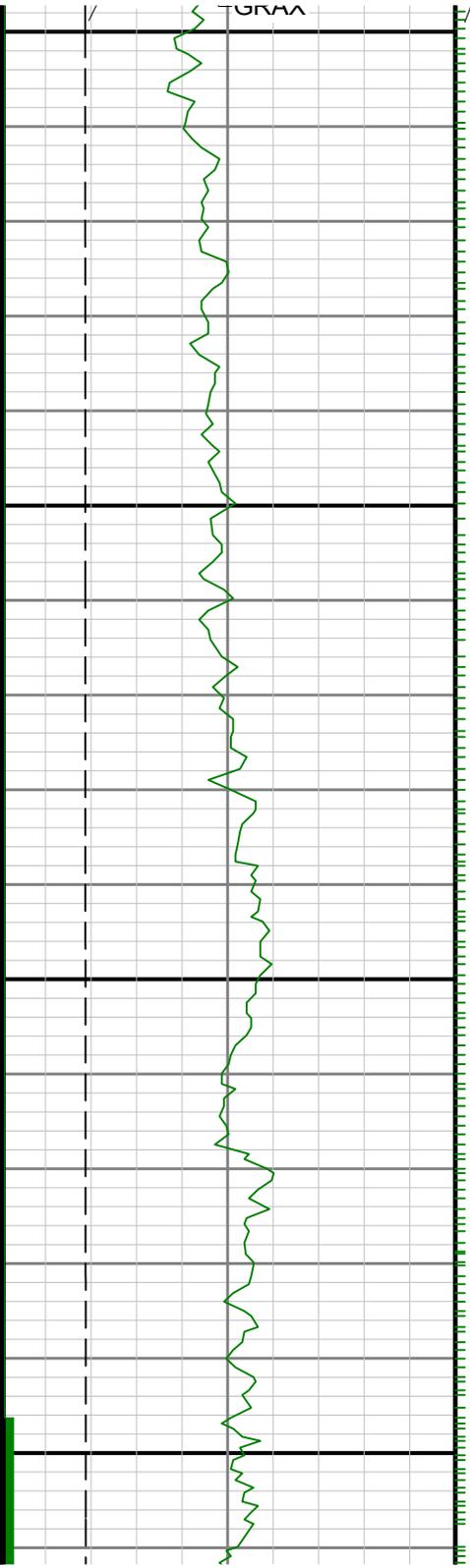


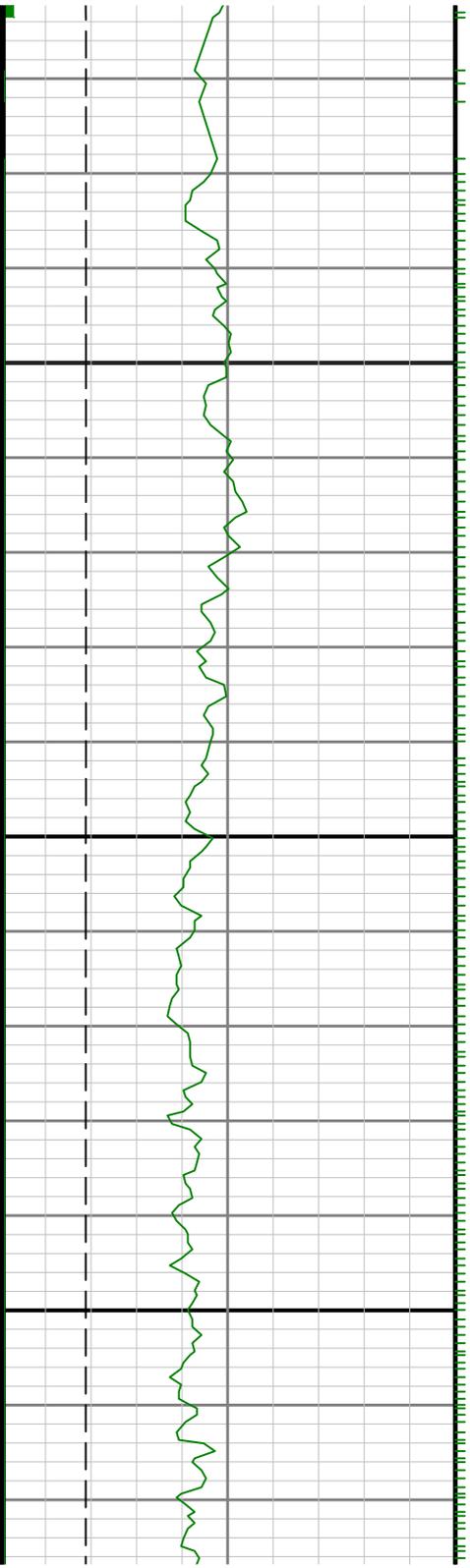
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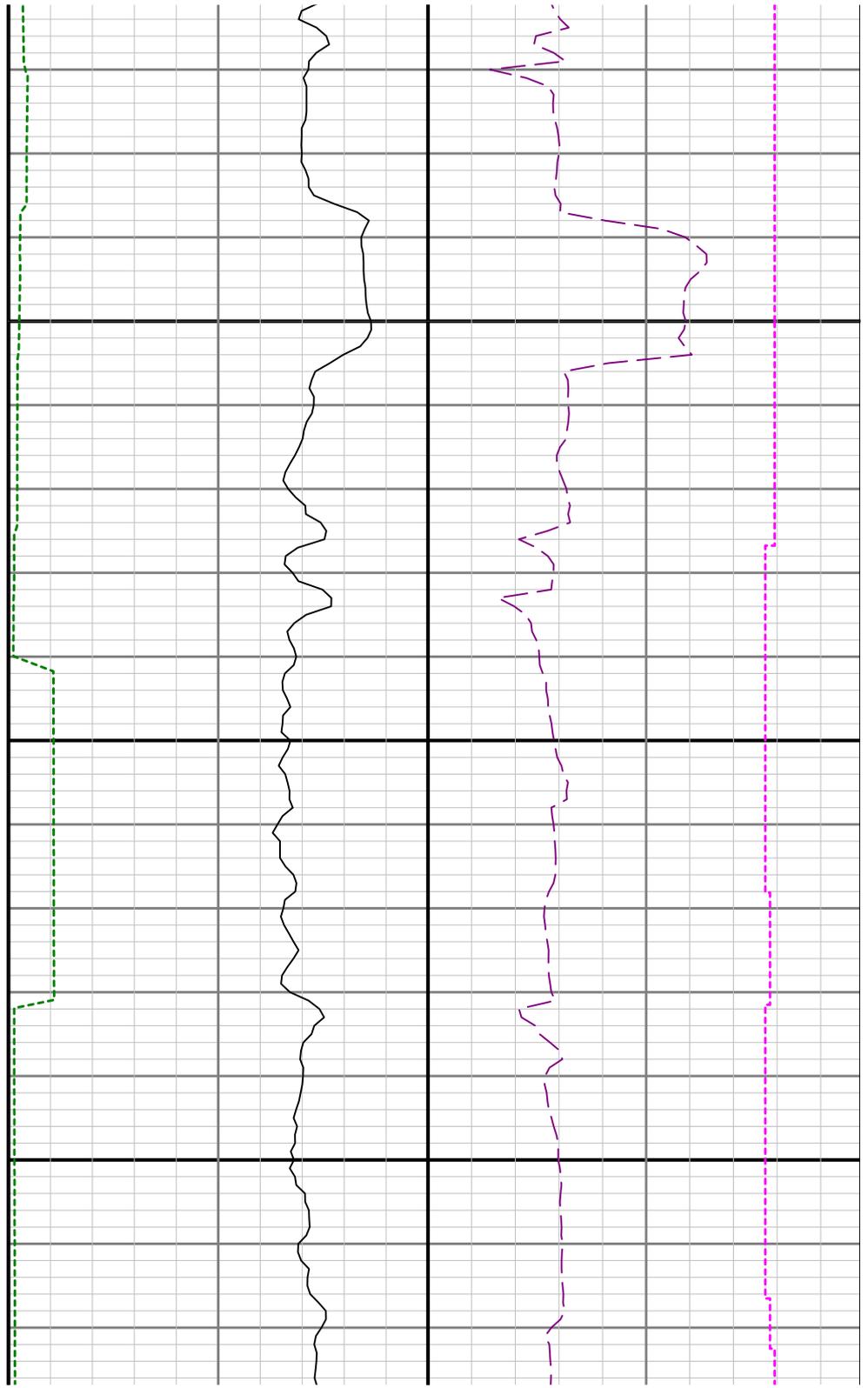


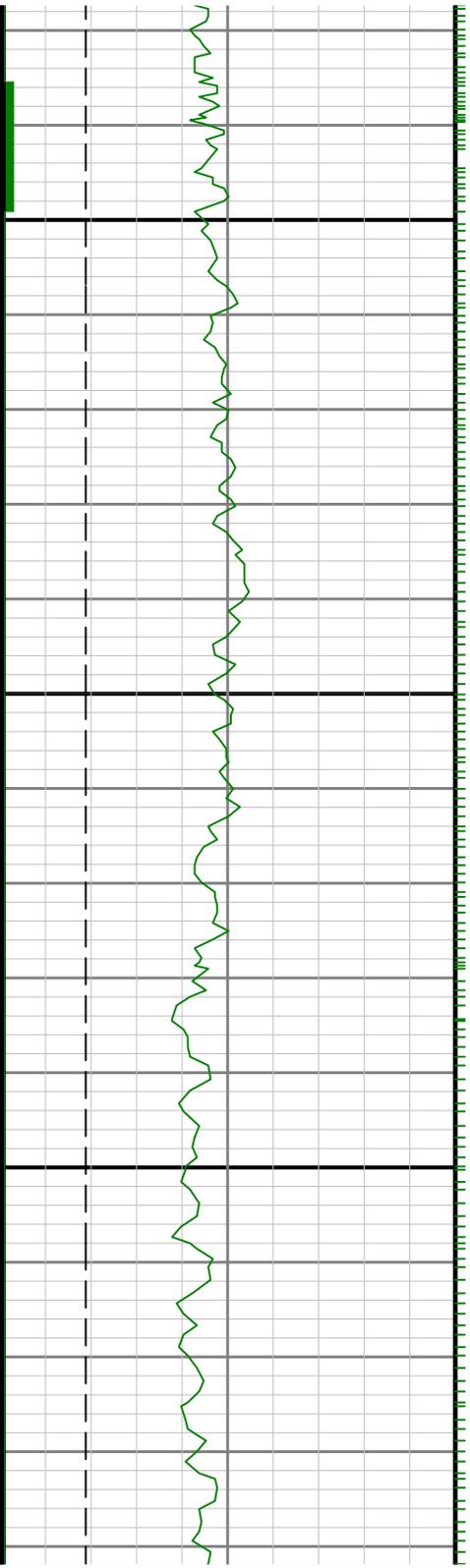




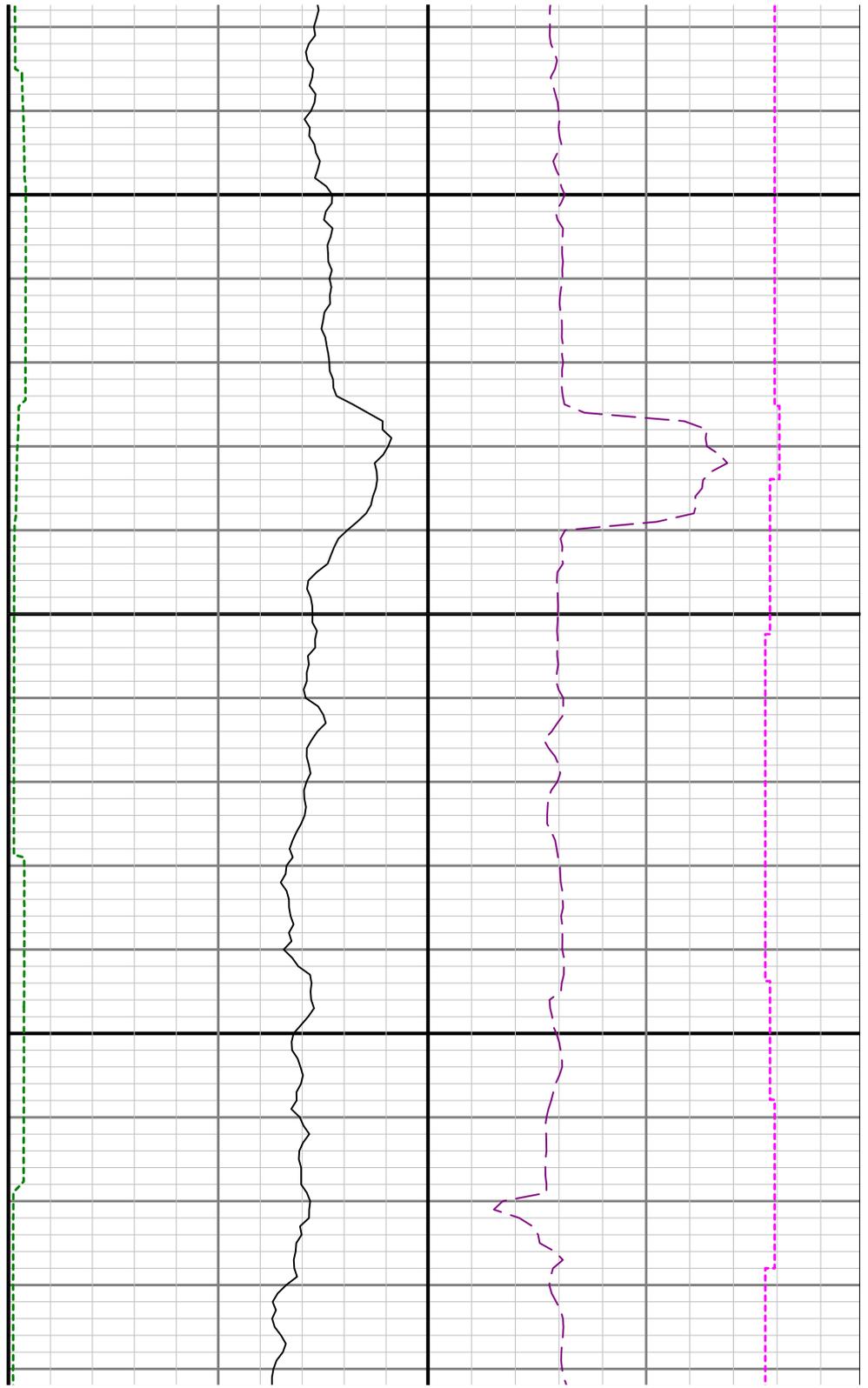
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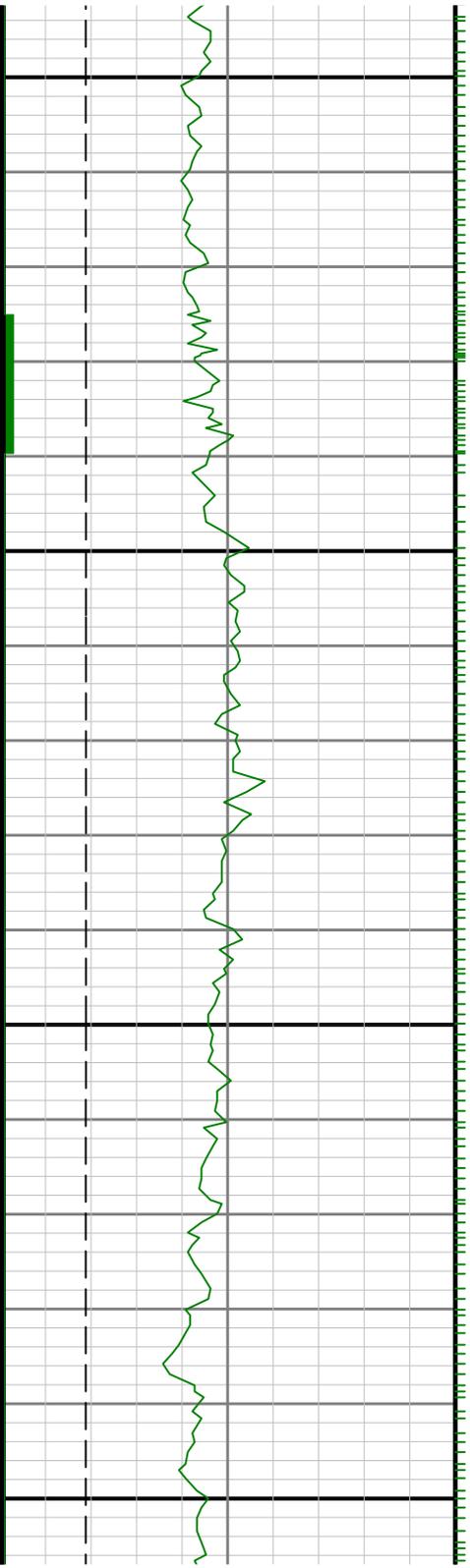
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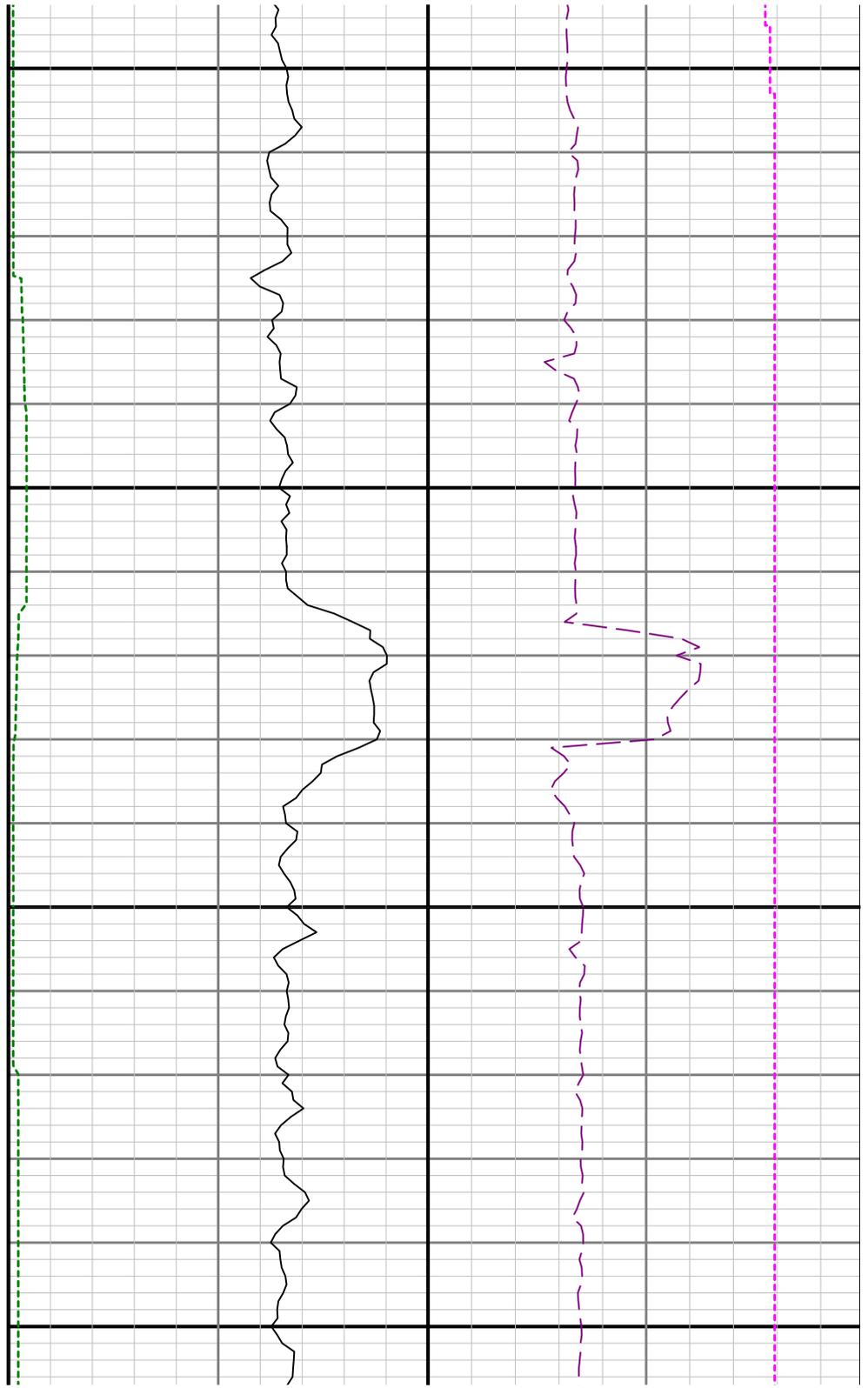
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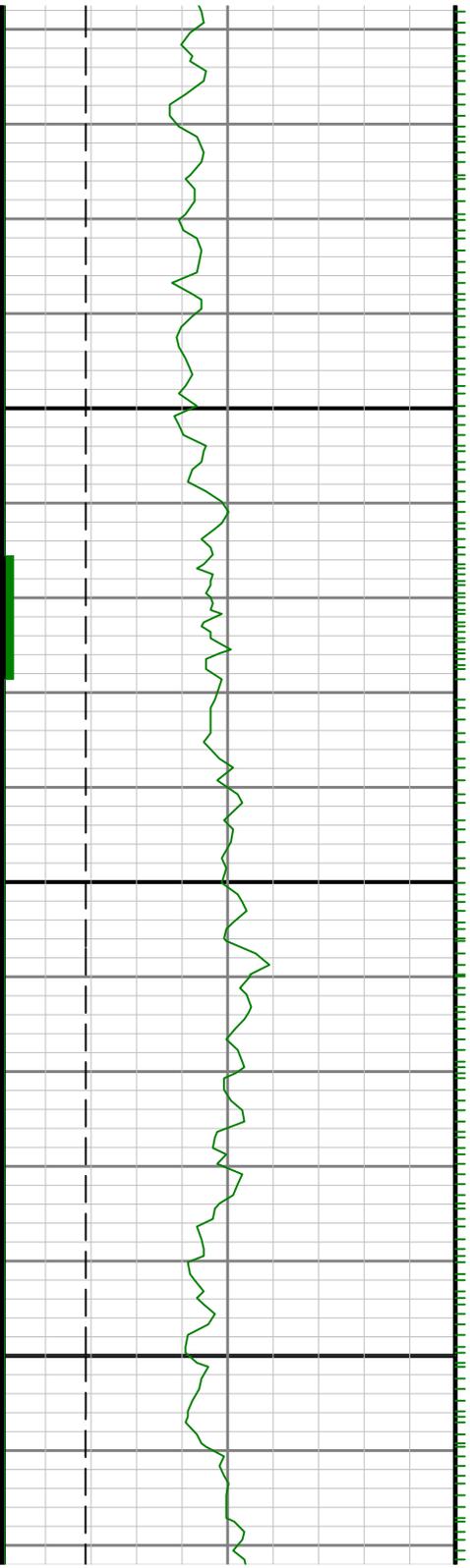




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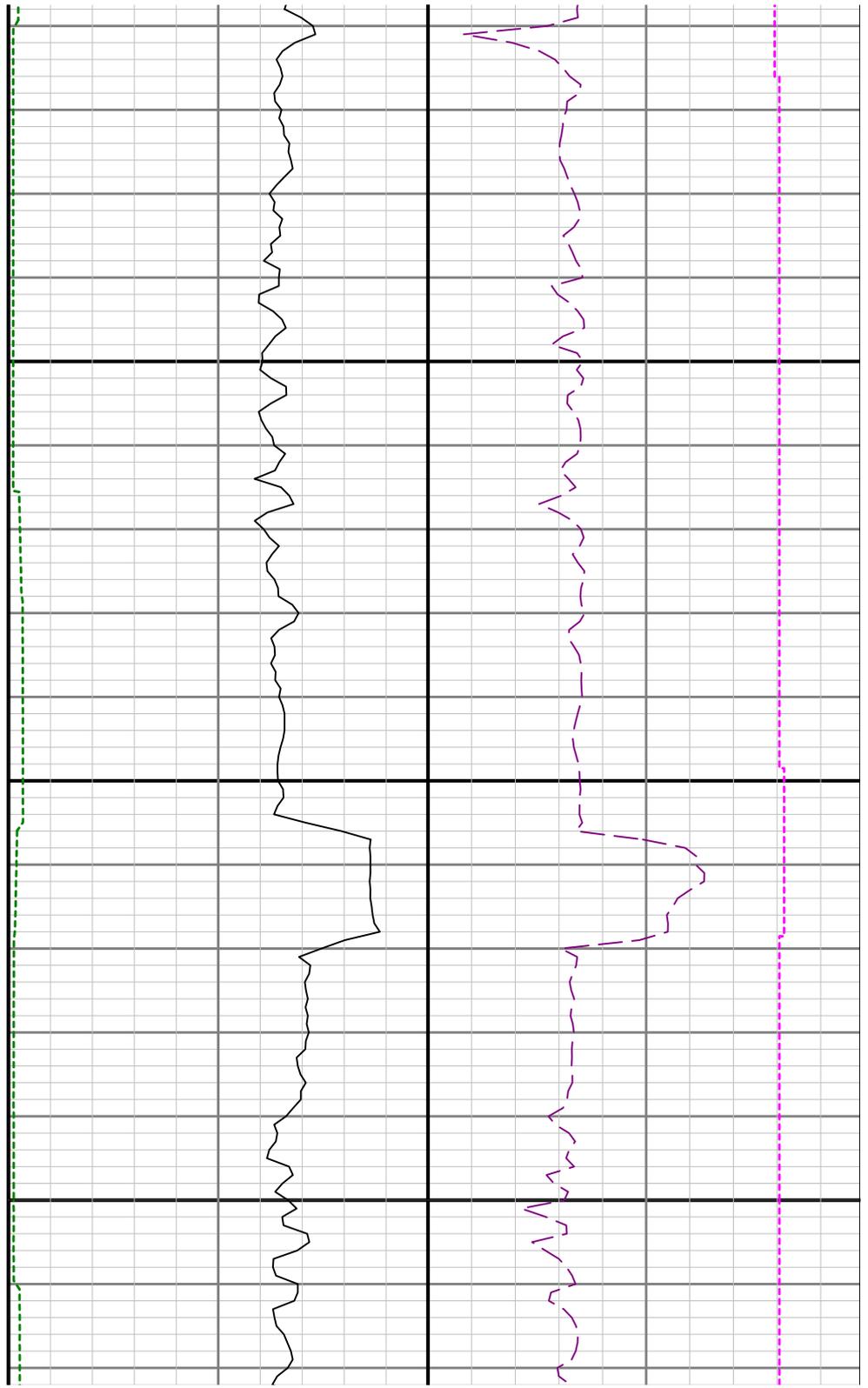
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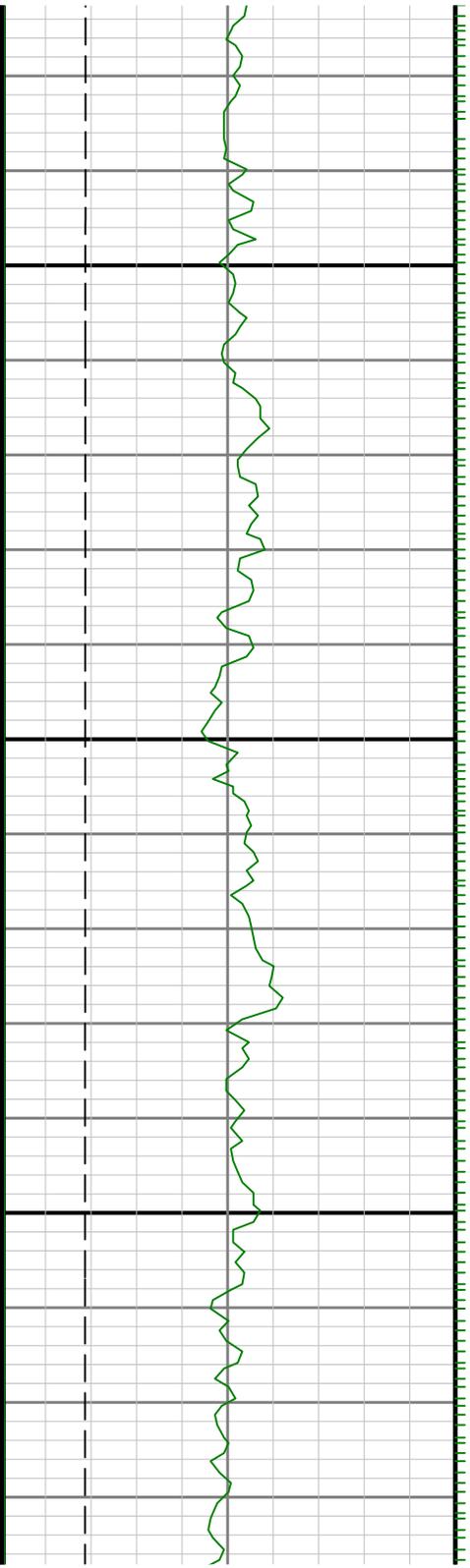




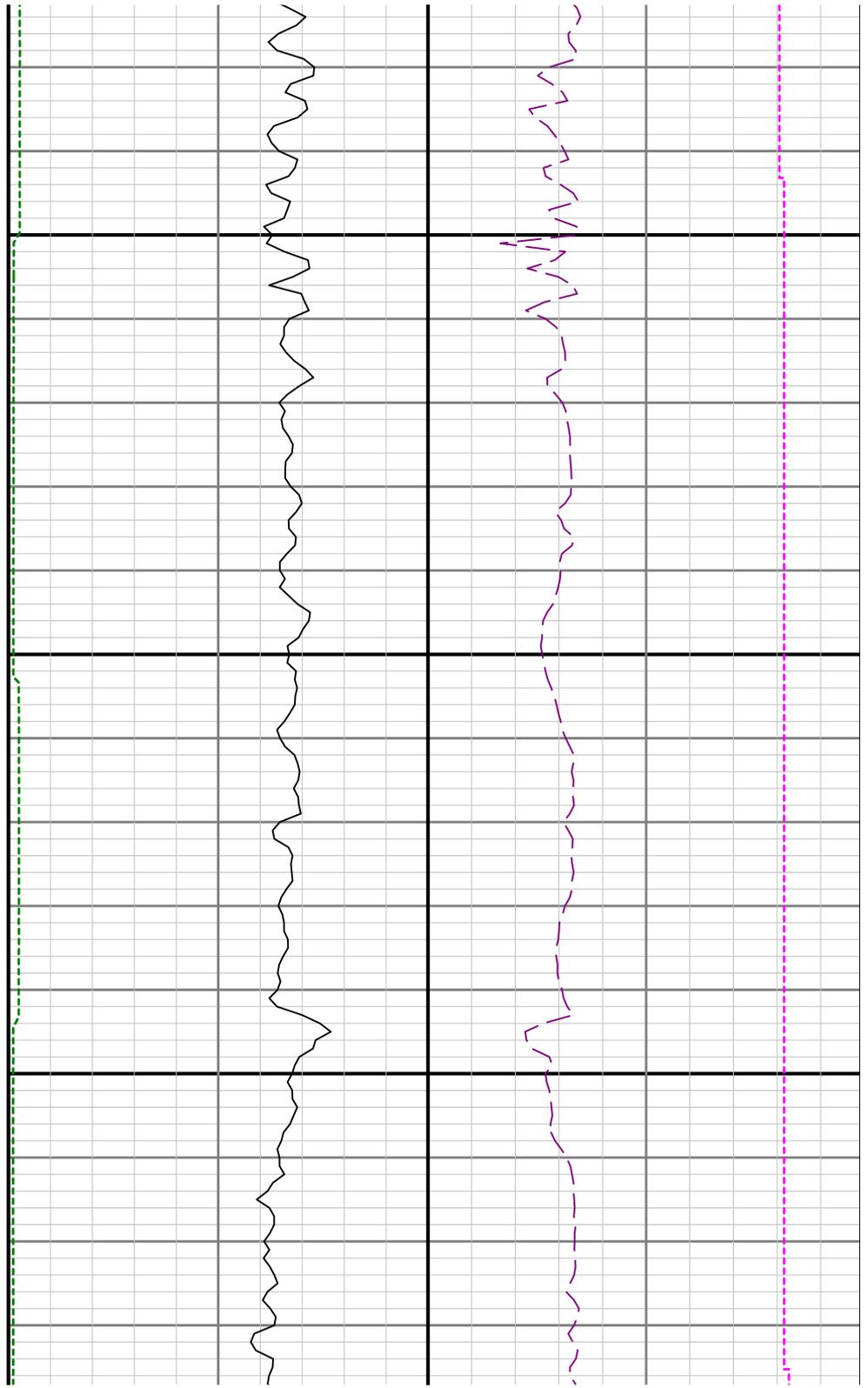
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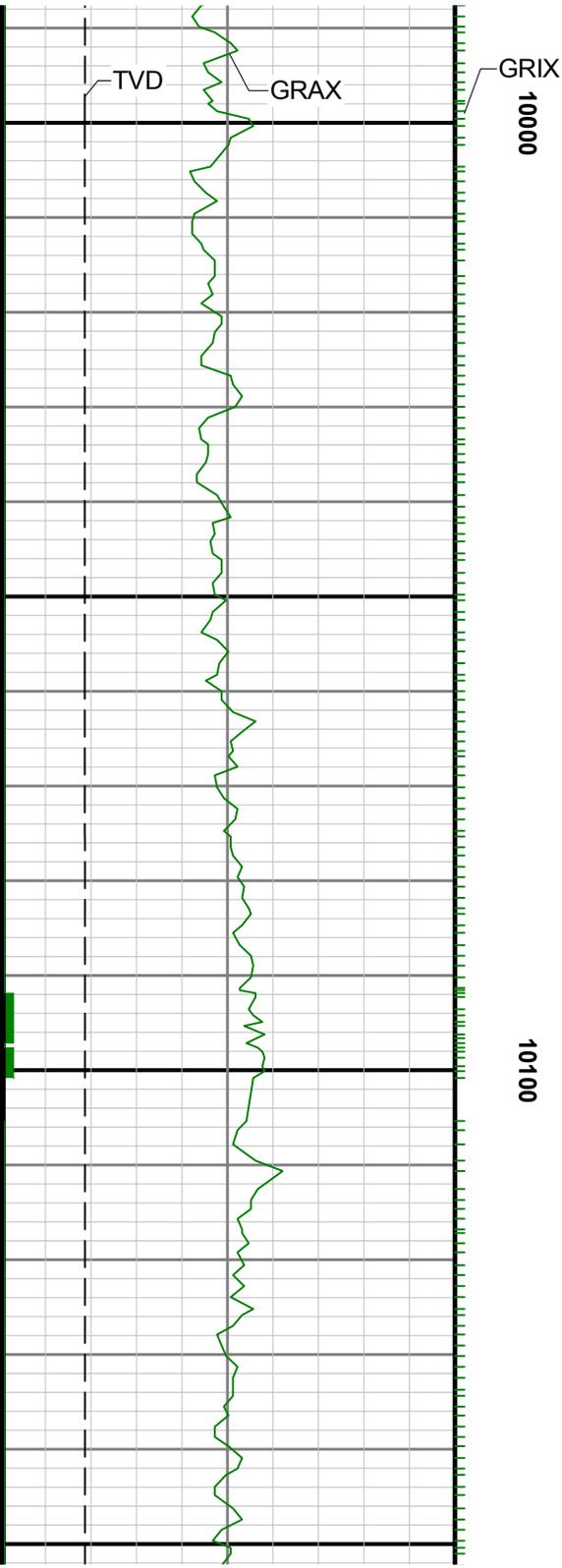
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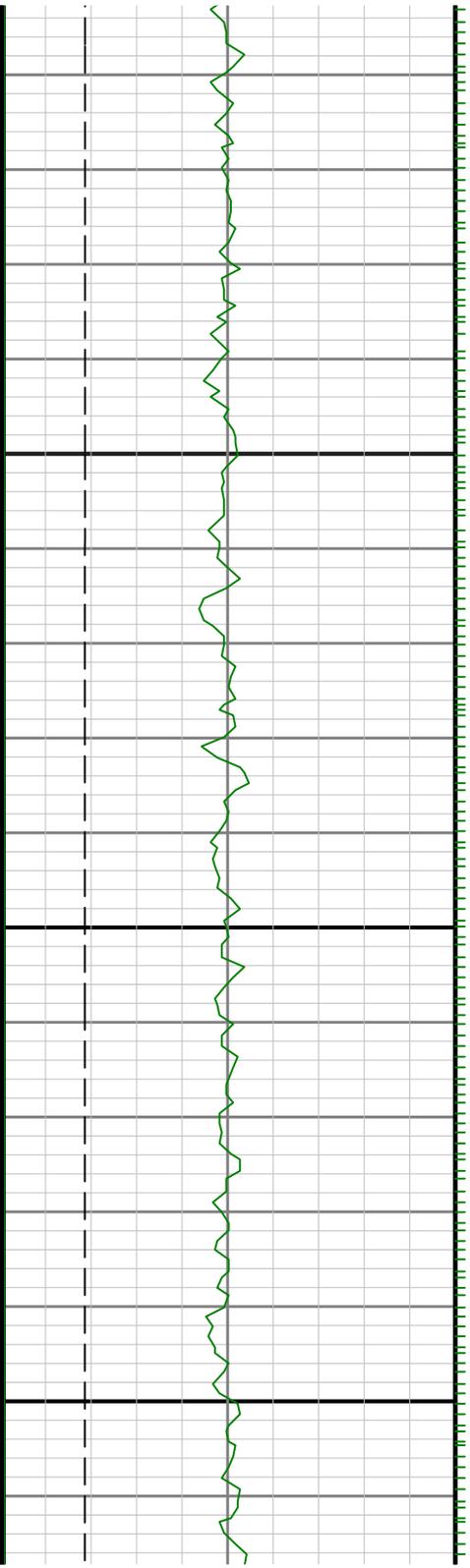




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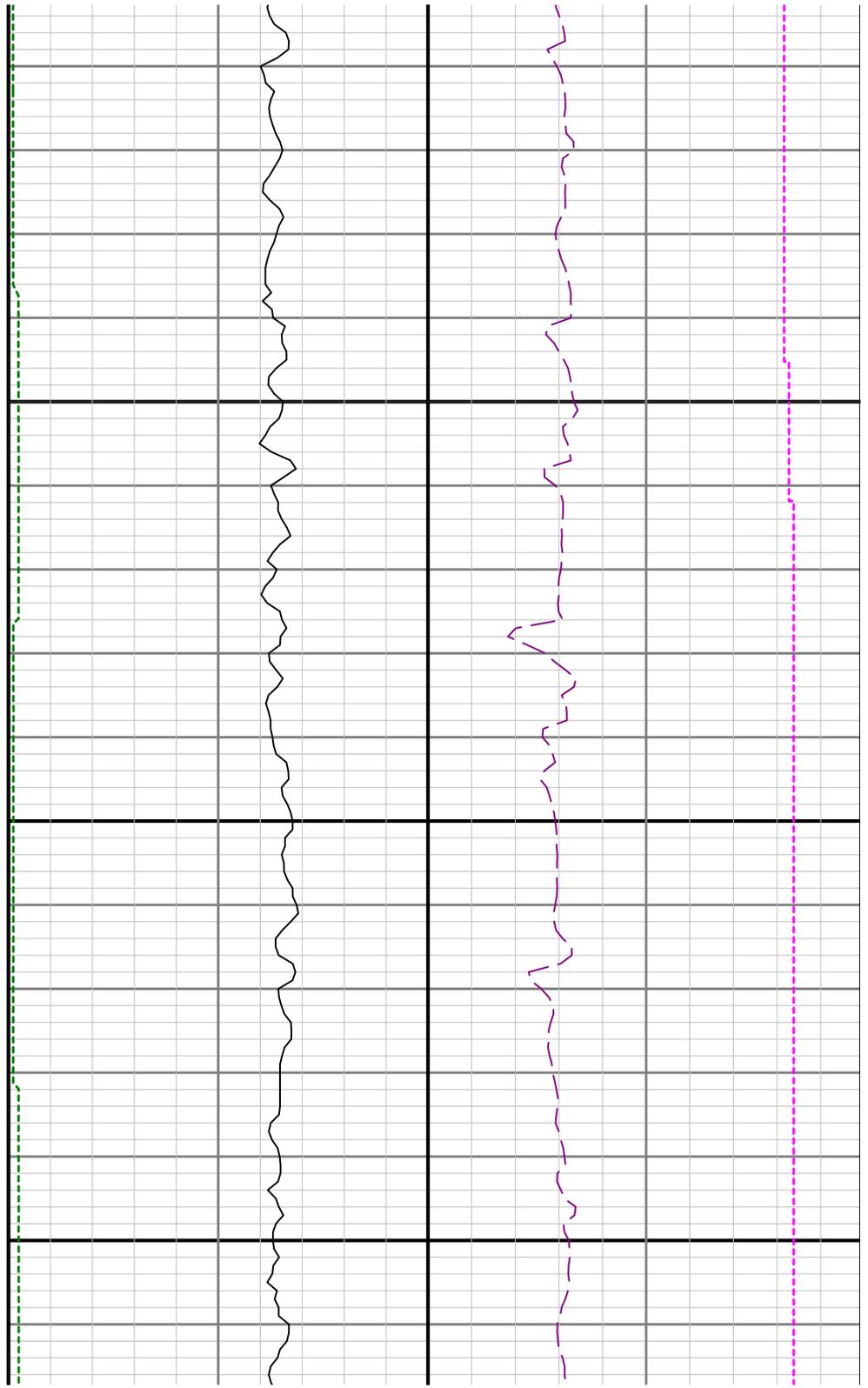






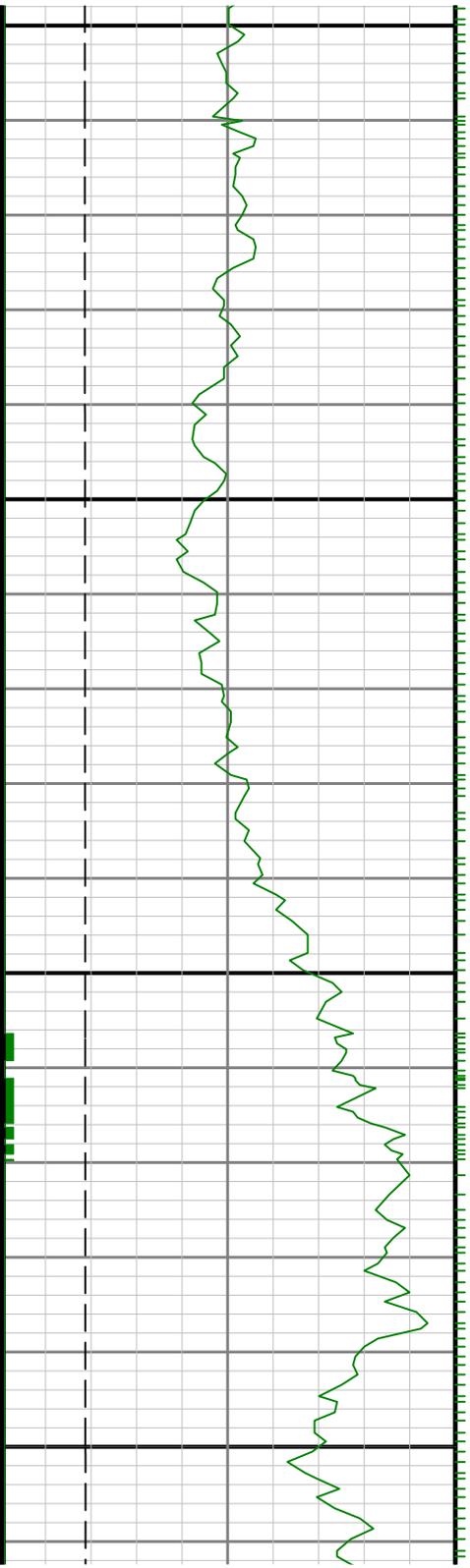
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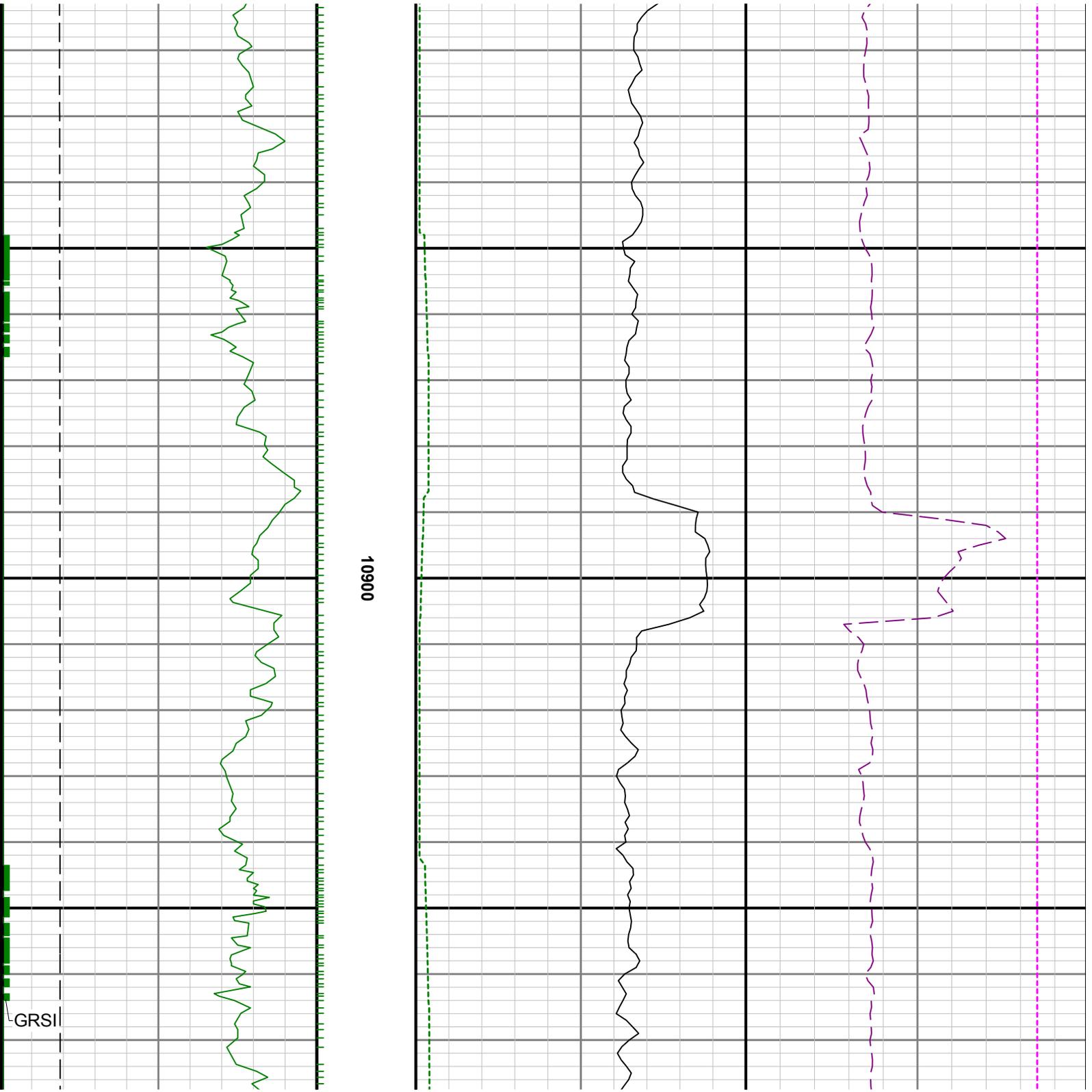


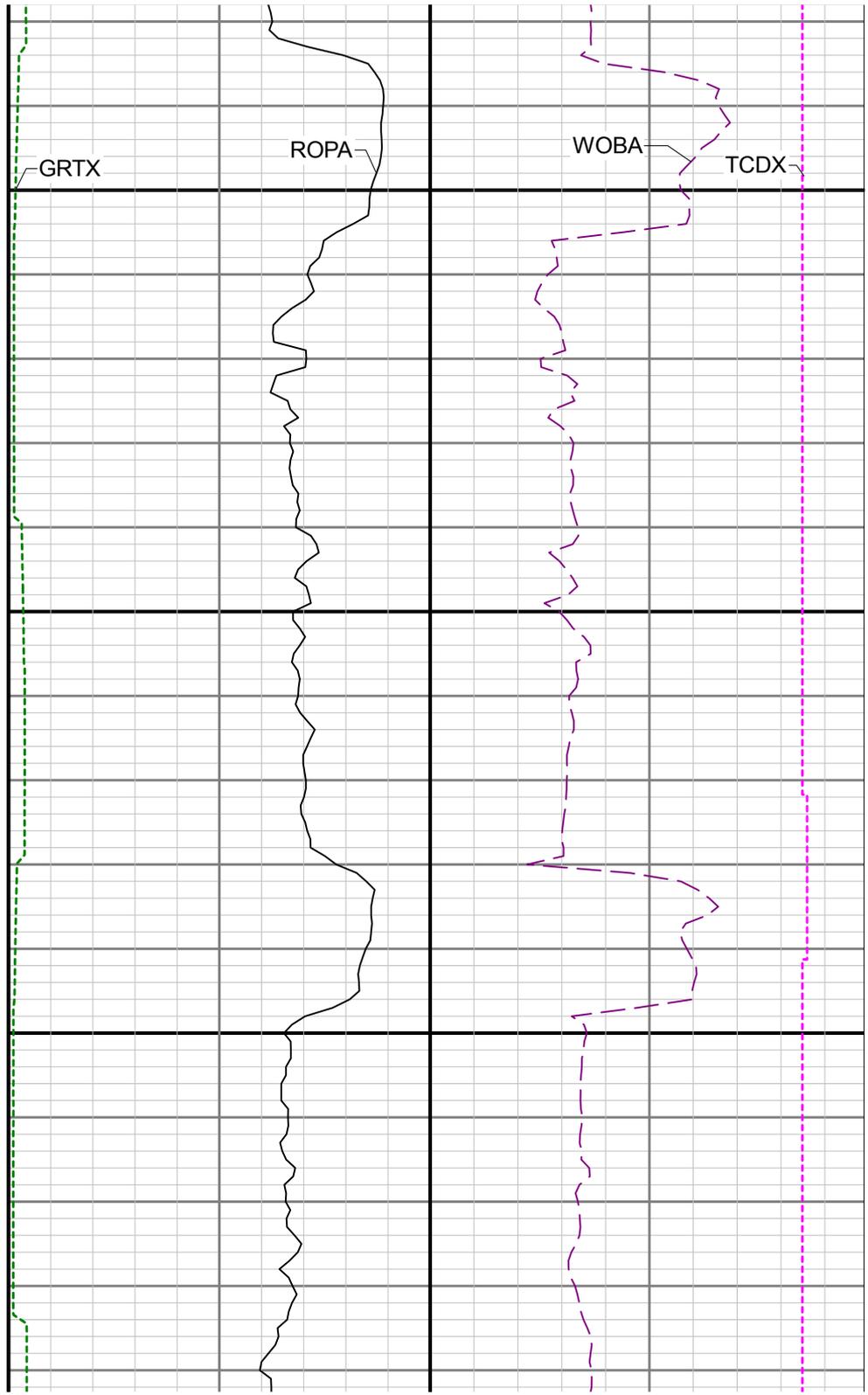
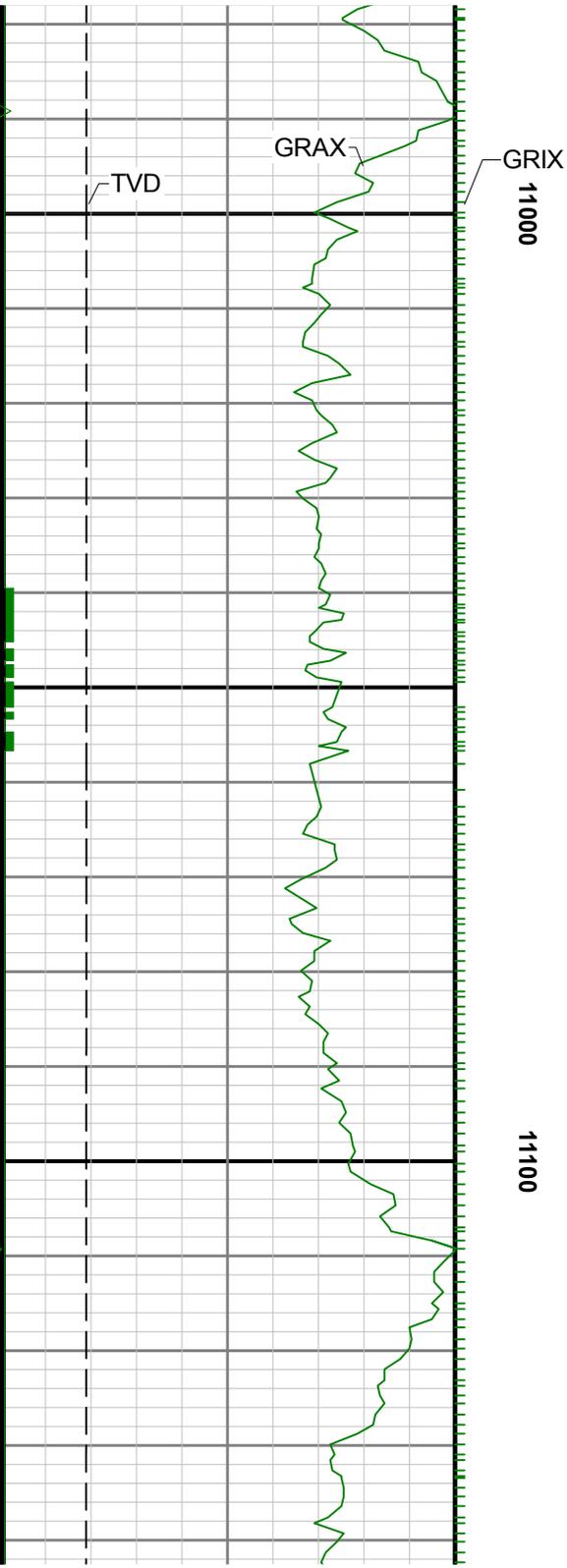


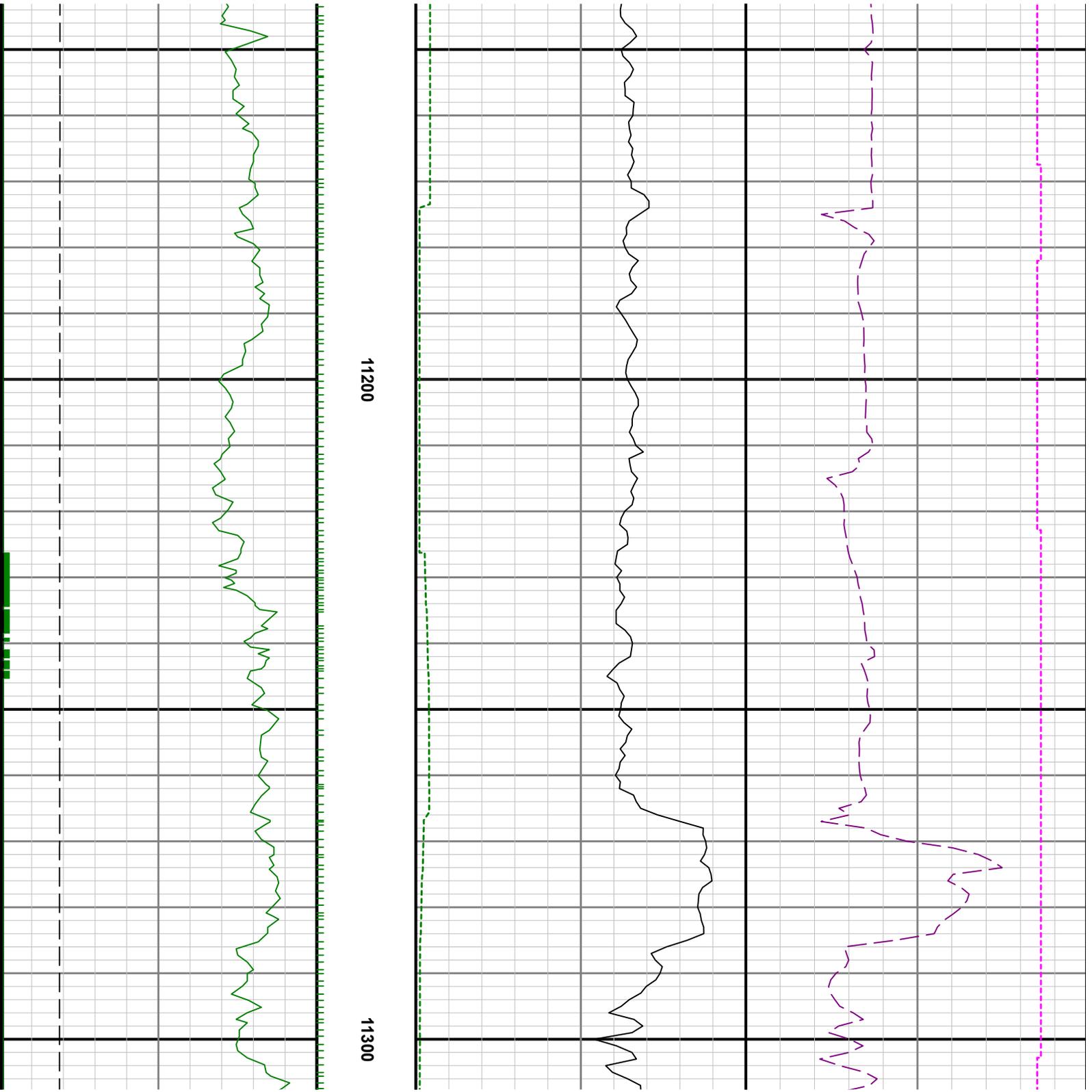
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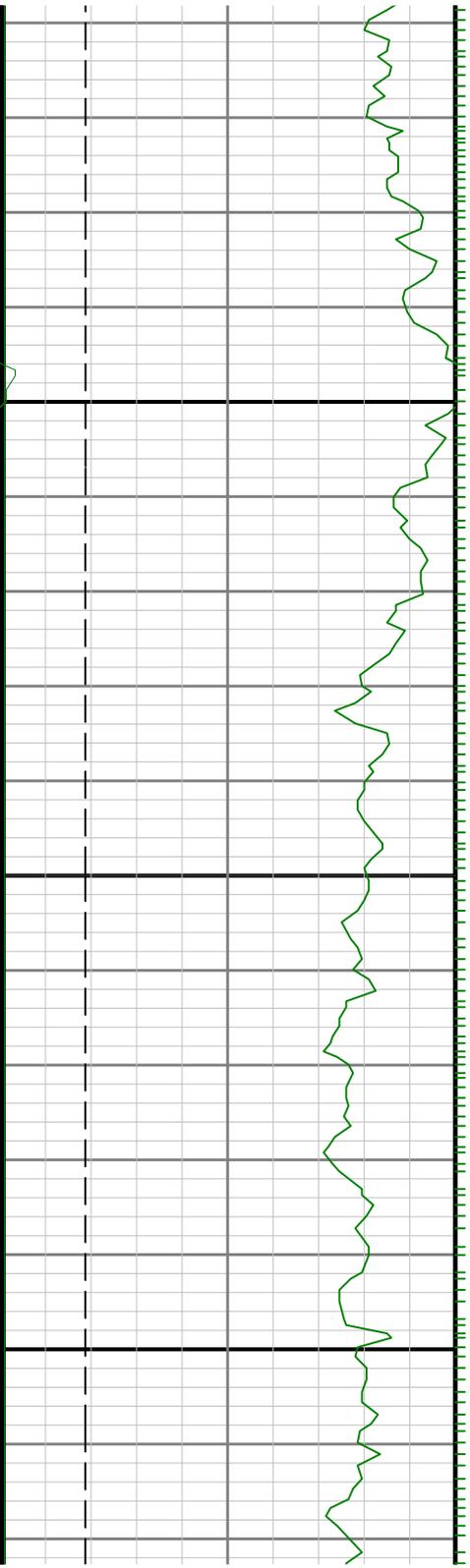
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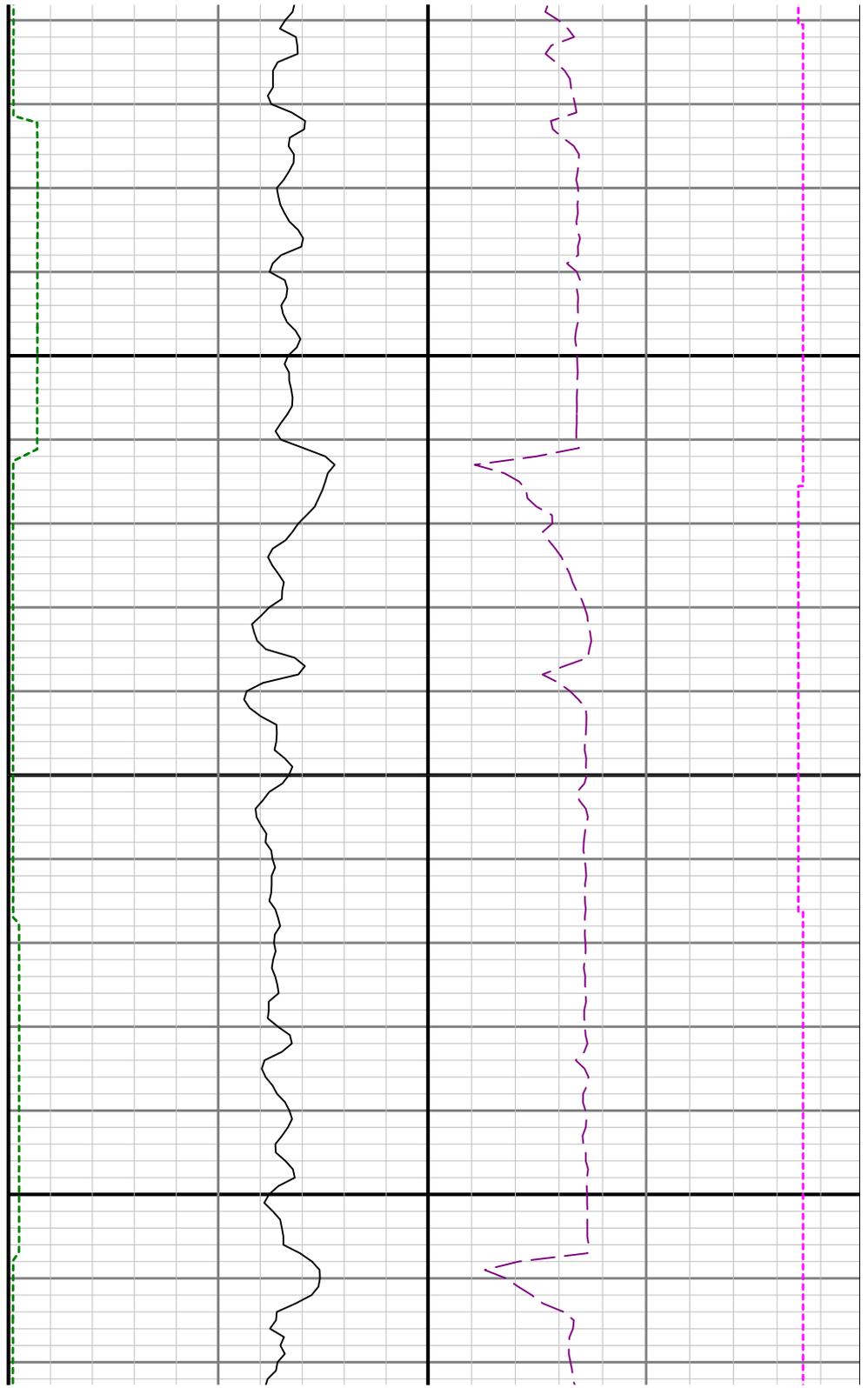


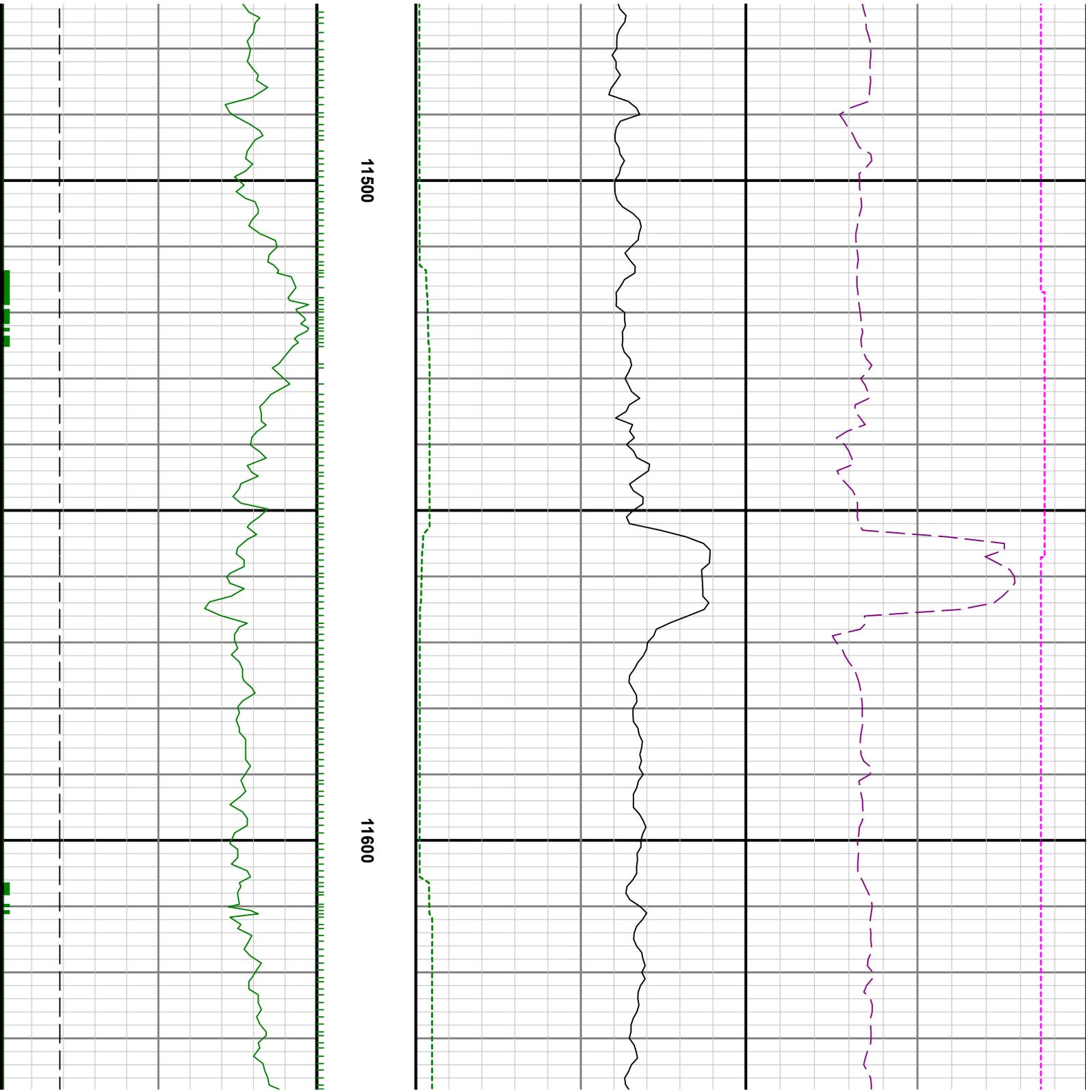


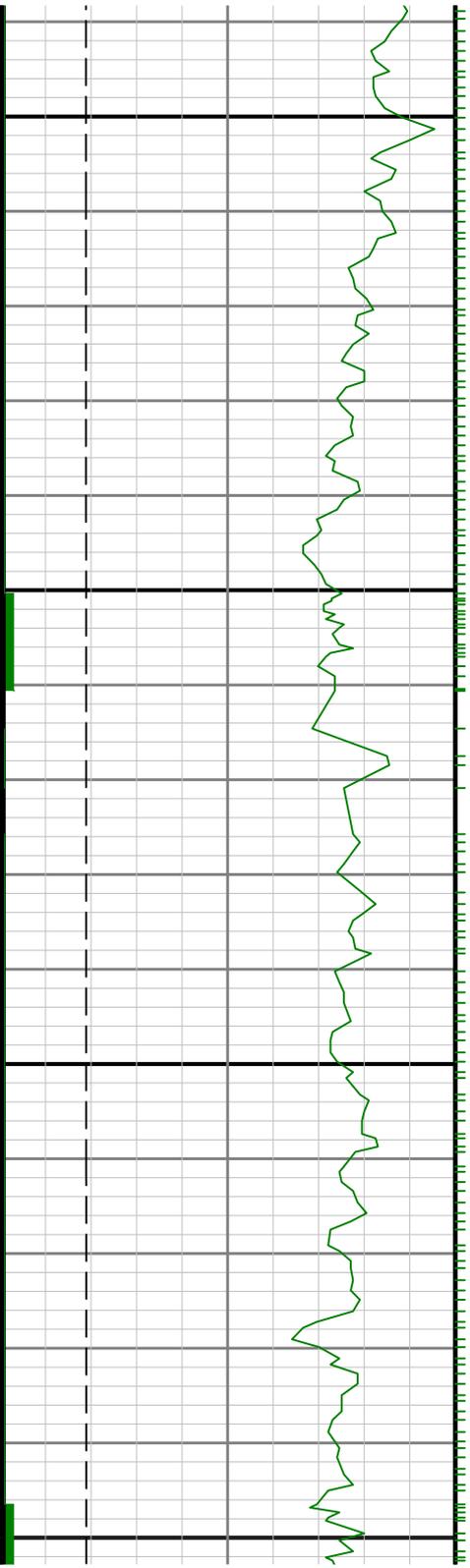




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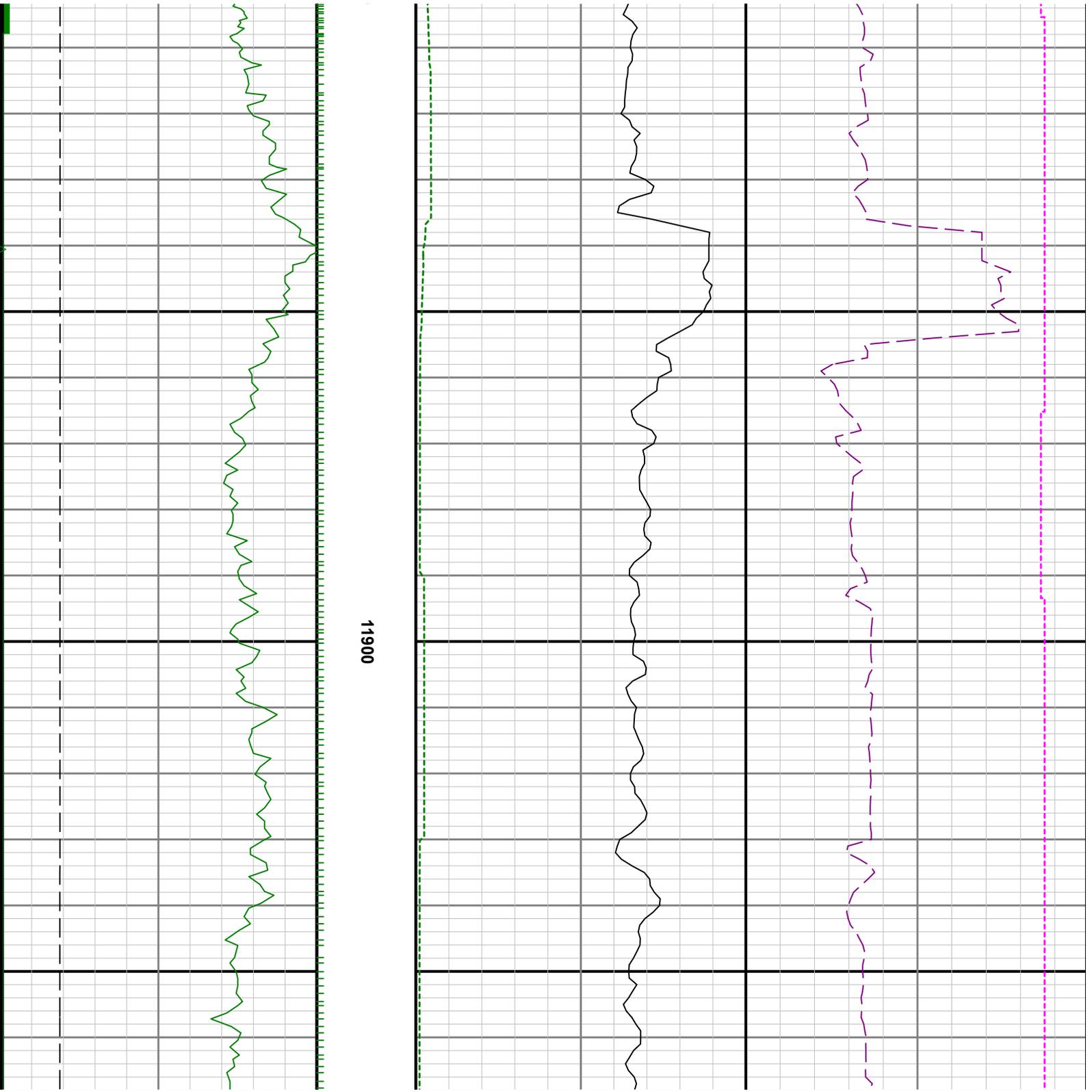


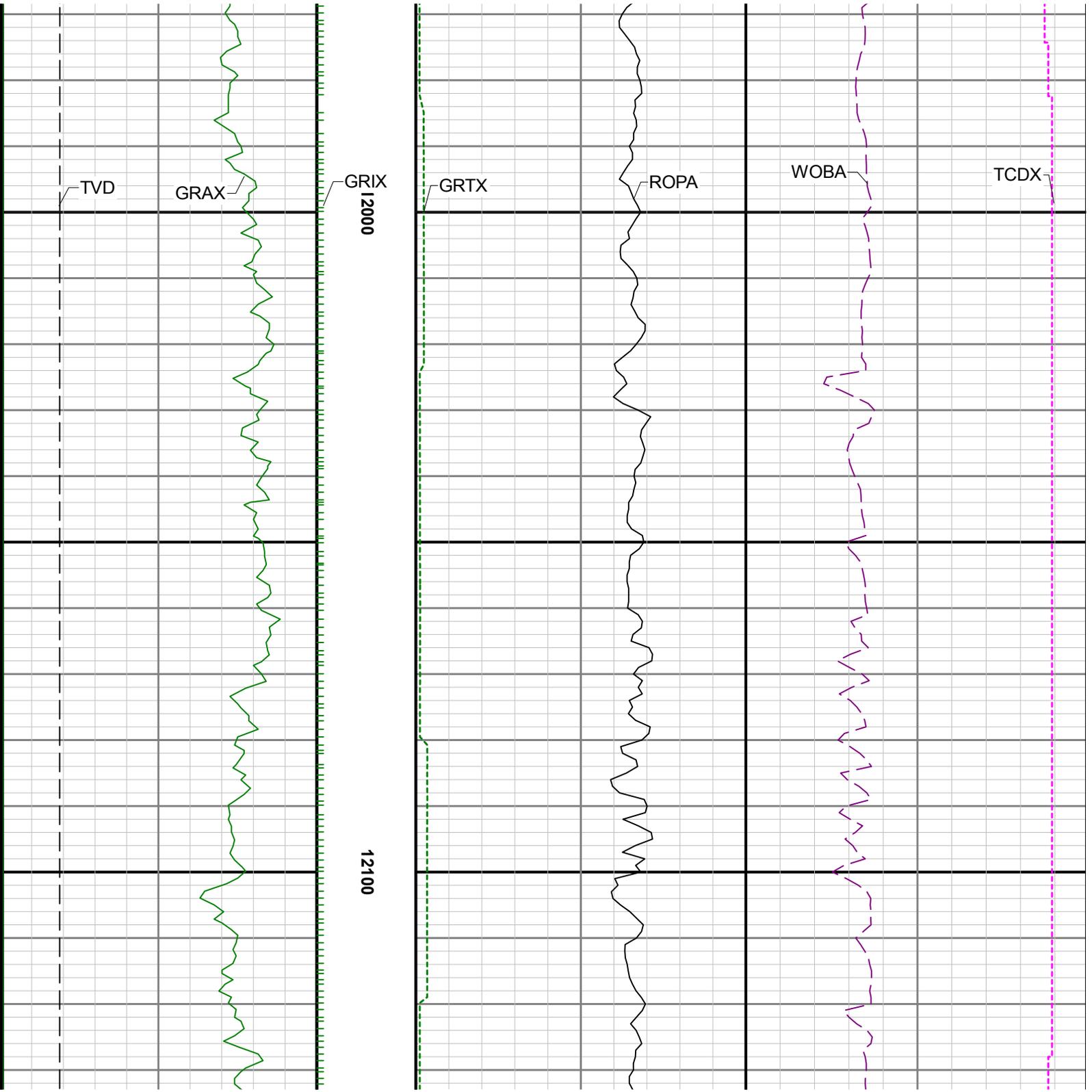


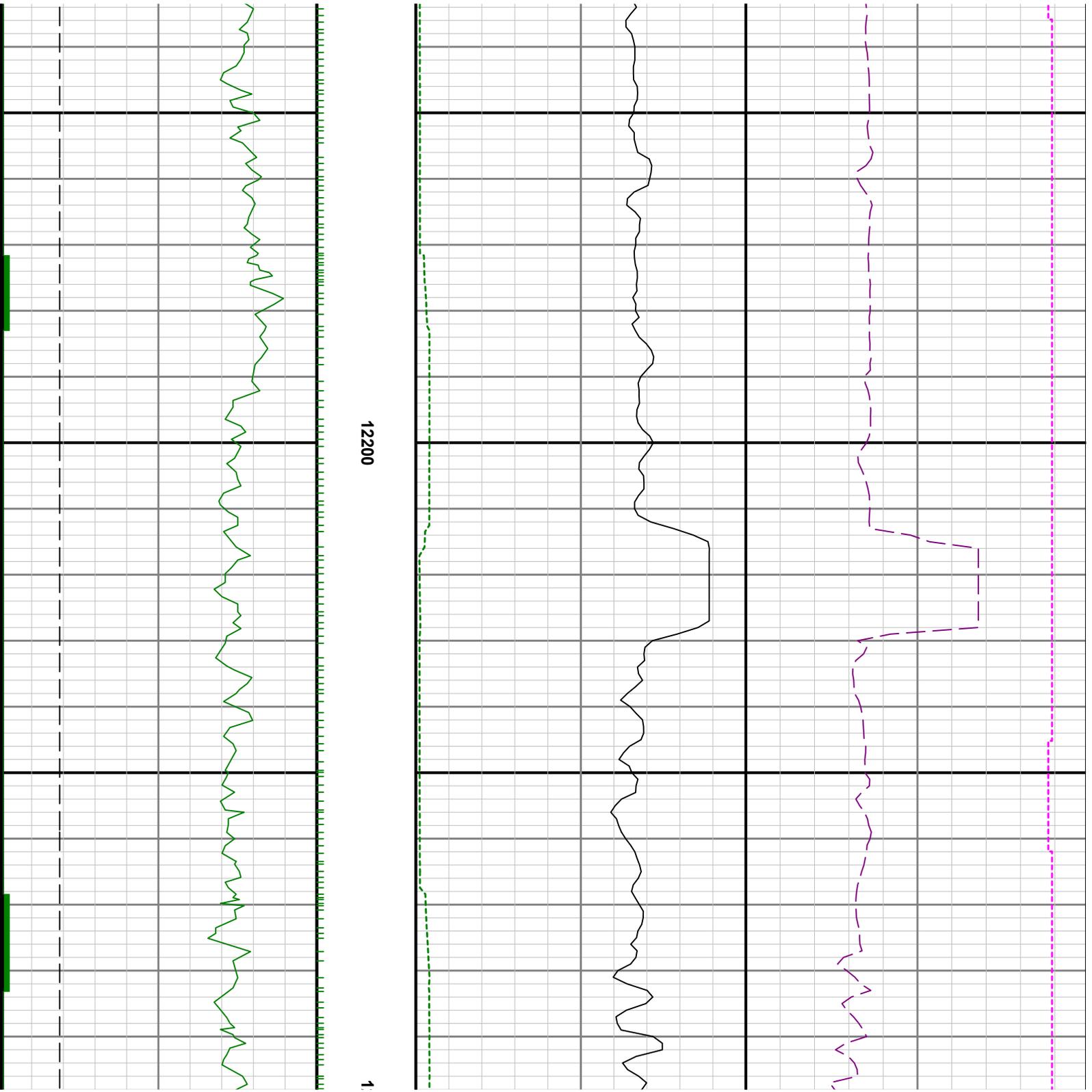
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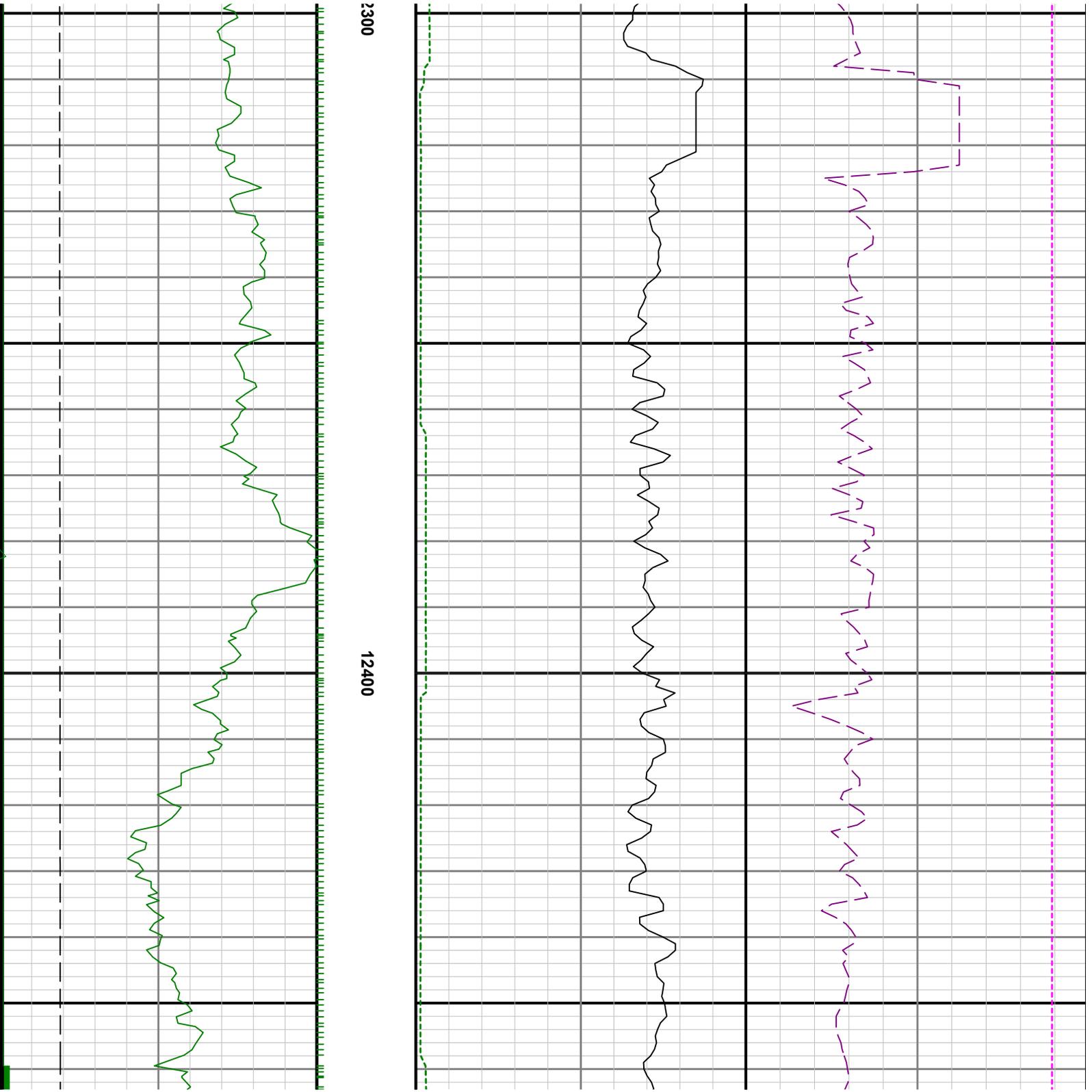
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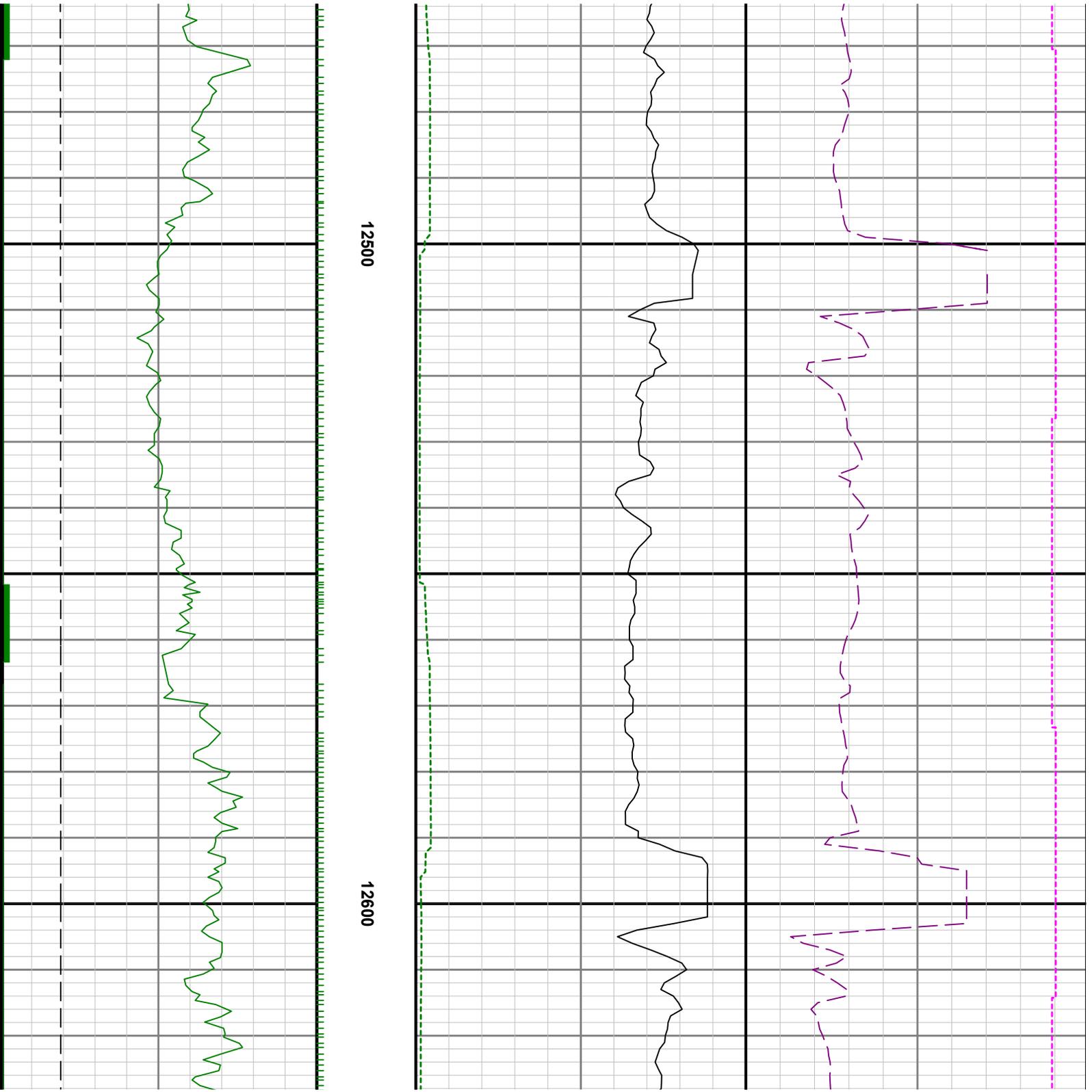


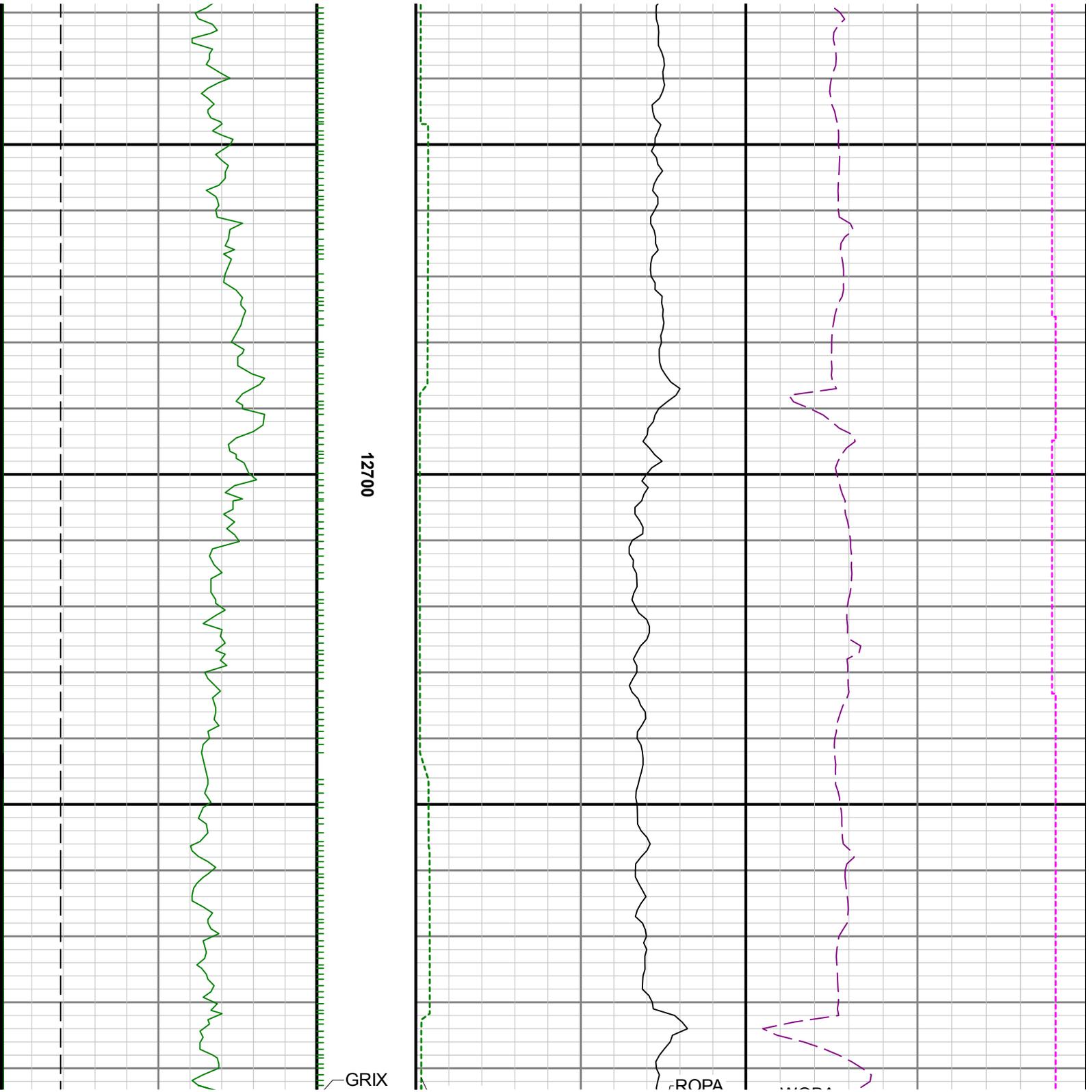


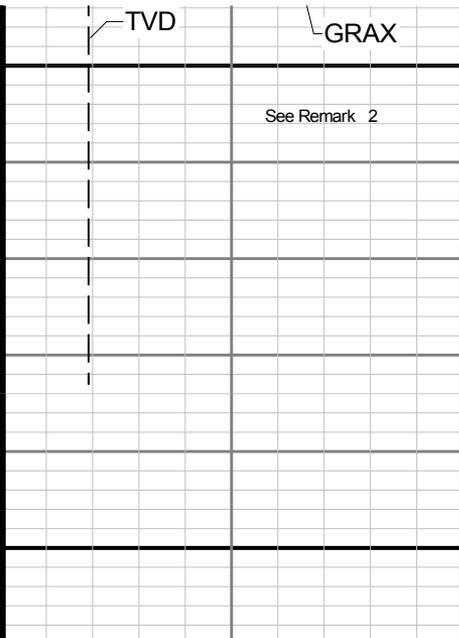


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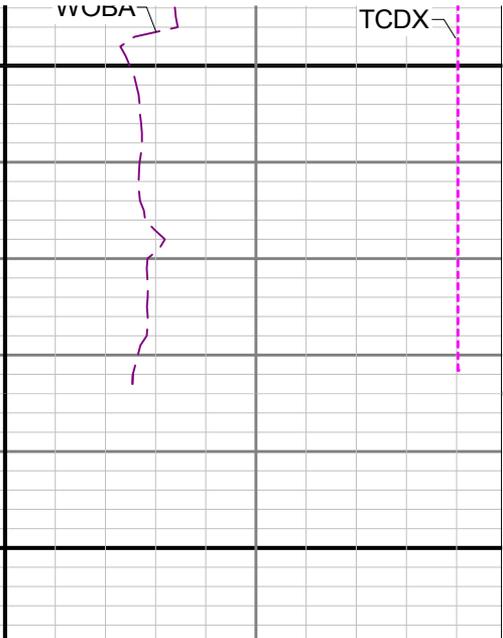
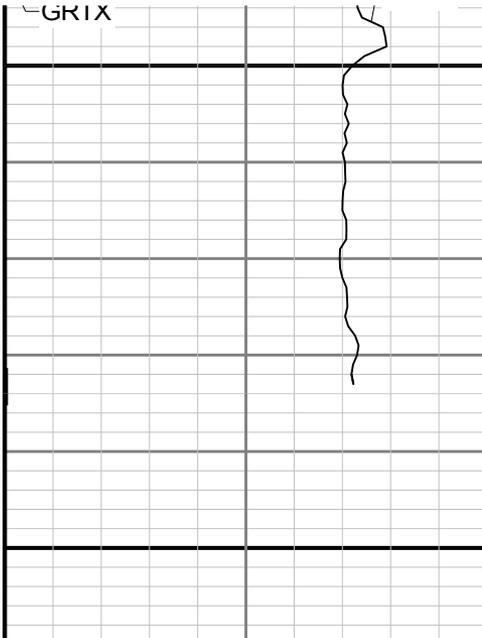






12800

TD



Gamma Ray Apparent 0.5 ft Average GRAX
0 150

API

True Vertical Depth TVD
7500 5500
ft

MD 1:240 feet

Rate of Penetration 3 ft Average ROPA
1000 0

ft/h

Gamma Ray Time Since Drilled GRTX
0 600

min

Surface Weight On Bit 1 ft Average WOBA
0 100

klb

Downhole Temperature TCDX
0 250

degF